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Four infantry companies were interviewed 1 to 4 days after stressful combat exposure (i.e., resulting in 20% to 60% KIA) on the Lebanon border. Most combat events were short, however, very intense. The interviews, in which all the survivors have participated, followed SLA Marshall Historical Group Debriefing Technique. Commanders were called to actively participate in leading the sessions. Self report questionnaires, pertaining to subjective distress, perceived peer support, appraisal of combat event, and ensuing psychological rumination of stressful events were administered to all the participants before and after each debriefing session. The sessions were recorded and transcribed. A second year of the study is now carried on through a continuation grant of the IDF "Man in Combat" project.

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FOREWORD

For the protection of human subjects, the investigator(s) have adhered to policies of applicable Federal Law 45CFR56.

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Summary

Four infantry companies were interviewed 1 to 4 days after stressful combat exposure (i.e., resulting in 20% to 60% KIA) on the Lebanon border. Most combat events were short, howeve very intense. The interviews, in which all the survivors have participated, followed SLA Marshall Historical Group Debriefing Technique. Commanders were called to actively participate in leading the sessions. Self report questionnaires, pertaining to subjective distress, perceived peer support, appraisal of combat event, and ensuing psychological rumination of stressful events were administered to all the participants before and after each debriefing session. The sessions were recorded and transcribed. A second year of the study is now carried on through a continuation grant of the IDF "Man in Combat" project.

Preliminary conclusions suggest that a degree of uncertainty, disorganization, misinterpretation of direct orders, and misreading of events is present in all combat events regardless to their outcome. Such elements often lead to positive initiatives and remarkable actions on the part of individuals, and thus should not be construed as being a negative occurrence or as "noise" which prevents the group from achieving optimal results. Despite of this ever-present uncertainty, an overall psychological appraisal of orderliness and purposefulness is maintained by individuals, preventing panic and fear. Further study of the degree, and the optimal configuration of the "chaotic" element of combat is recommended.

Data, pertaining to the descriptive element of the study (i.e., group narrative of combat events) has been presented in international forums (enclosed). A basic literature survey, written in conjunction with this study, forms a book chapter (in print, enclosed). Data from self report questionnaires will be analyzed on completion of the second year of the study.

92-07493

Objectives of the study

As stated in its original design, the study of <u>Historical Group Debriefing Following Combat Exposure</u> had three main objectives:

A. To collect a comprehensive narrative of combat-events with all their complexity through group-reconstruction of the event using a protocol derived from SLA Marshall's historical group debriefing technique.

B. To measure the effect of participation in such debriefing sessions on individual soldiers' perceptions of the event, perceived social support, perceived self-efficacy in combat and emotional response to combat.

C. To identify individual traits (such as coping style, denial and social desirability) which might modulate the psychological effects of combat and of combat-debriefing on soldiers.

Work Accomplished

In order to achieve these objectives the researchers have conducted SLA-Marshall type interviews in four infantry companies of the IDF 1-4 days after combat exposure. All combat events occurred at the Lebanon border and involved small units exposure to ground combat. All the events were perceived as being highly stressful by the participants and three of the four involved a substantial number of casualties (from 20 to over 50 percent) including a number of KIA. In a fifth event the interviewers were allowed to assist at a commander debriefing but not to conduct their own session.

The combat event included mainly ambushes. In two cases IDF unit went into the enemy's ambush. In another case - an ambush set by a small unit resulted in heavy casualties for the unit that had set the ambush (5 out of 10 KIA).

The sessions followed SLA Marshall's protocol - i.e., step-by step group reconstruction of the event by all the participants, respect for every detail and all points of views, mobilization of group-processes which support openness and disclosure, abstinence from teaching lessons, criticizing or otherwise using the material revealed during the session for other military purposes. Written informed consent was obtained from each of the participants prior to the session.

The sessions were recorded and the full narrative of the action was transcribed. All the participants completed a battery of self report questionnaires before and after the session - including measures of the stressful impact of the event, situational anxiety, self efficacy in combat, combat exposure scale, perceived peer support and social desirability.

Prior to accessing the units, substantial effort was devoted to contact line officers at the division and the brigade levels, to present the study to these officers and to obtain their endorsement for the project. A viable link has been created, that way, between the line units

and the research group at Hadassah University Hospital in Jerusalem, enabling immediate warning of the research team at each incident. Lessons learned from that preliminary phase emphasize the need to contact directly battalion- and brigade-commanders rather than division commanders and to have an agent, within these units, (e.g., the medical officer) who takes an active part in the project and whose authority opens doors and hearts.

Preliminary impressions are provided in the form of a paper read at the Royal Army Medical College in London, Oct, 1991 (enclosed).

Continuation of the study

As suggested in the grant application, a second year of this study is now being carried out, funded by the Man in Combat project of the Ministry of Defense, Israel. The goal of the second year is to increase the data set and include a larger variety of military units and combat events. Data collection, group interviews and contact with commanding officers is, therefore, still going on as the team at Hadassah University Hospital is on alert for any significant combat event at the northern front of Israel.

Published work and public presentations.

I. Preliminary work

1. A. Shalev A. Ursano R.J. Group Debriefing Following Exposure to Traumatic Stress. in Lundeberg JE, Otto U & Rybeck B (editors) Wartime Medical services FOA , Stockholm, 1990, p. 192-201

2. A. Shalev Debriefing Following Exposure to Trauma in RJ Ursano (ed) "Individual and Community responses to Trauma and Disaster" Cambridge University Press, in print

II. Reports of debriefing sessions:

3. Shalev A. Group Debriefing Following Traumatic Exposure. Royal Army Medical College - Defence Medical Service Military Psychiatry Conference. London, 14-17 Oct 1991. (Copy provided to Department of Military Psychiatry Walter Reed Army Institute of Research)

4. Shalev A. Chaotic unfolding of combat events - rare contingency or common occurrence? Israel Annals of Psychiatry and Related Discipline (submitted)

Final Report

The final scientific report, including analysis self-report questionnaires, narratives of various combat events, operational conclusions and recommendation for implementation will be published at completion of the second year of the study, which is carried out this year.

Historical Group Debriefing Following Combat Exposure

Lecture
to the Royal Army Medical College - Military Psychiatry Seminar

October, 1991

By Arieh Y Shalev, M.D.

Debriefing is a group-oriented intervention in which the major elements of an event are reviewed by the participants, shortly after its termination. Debriefing has been recommended by several authors..as stress management technique, suitable for groups exposed to traumatic events, and has been practiced, as such, by several rescue organizations.

Although intuitively helpful, the structure of this technique, its goals and its mechanism of action have not yet been defined. In the following I shall try to share with you what I have learned from reviewing several debriefing protocols reported in the literature. and from conducting debriefing interviews with infantry units in Israel.

Introduction
I would like to start by presenting a series of trivial statements

A. Disasters, wars and traumatic events regularly result in immediate and long-term psychological changes among the individuals affected, ranging from the most pervasive forms of post traumatic stress disorder (PTSD) to a variety of positive learning experiences. The immediate reactions to traumatic stress include all possible forms of human suffering, along with massive attempts to cope with the effects of the exposure. A wide variety of symptoms has been documented including paralyzing anxiety, cognitive disarray, dissociative and conversion reactions, psychological and physiological depletion, and emotional numbing. These immediate reactions constitute an urgent appeal for specialized care, indeed, as Baverly Raphael says, for "every comforting human response" capable of reducing the suffering involved.

Such is the primary goal of all early interventions that follow trauma.

B. Long-term studies populations that had been exposed to stress (e.g., Green, 1987, Solomon et al.1987; Kulka et al, 1989) show that a substantial number of survivors will suffer from after effects for prolonged periods. PTSD is the most widely recognized consequence of trauma but is far from being the only one: a variety of psychiatric disorders including depression, dysthymia, phobias, dissociative disorders, alcohol and drug abuse has been documented, along with profound personality changes, increased physical morbidity, high rates of mortality and an uncontrolled trend to re-enact the trauma by repeated self-exposure or victimization of others.

These long-term effects add another goal to early treatment efforts - namely the prevention of post traumatic morbidity.

C. Another long-term effect is typical of institutions in which stressful exposure is part of a professional duty (e.g., armies in continuous war, fire fighters, police, rescue teams). Traumatic exposure, in these cases, is often repetitive, resulting in re-traumatization, over sensitization fatigue, loss of motivation, problems in impulse control and burn-out.

This adds a third goal to early intervention: the prevention of burn out, of anticipatory anxiety, and of inadequate reactions to subsequent exposures.

D. Newly introduced evidence shows that secondary stressors that follow the traumatic impact and those of the recovery environment might have a profound effect on

psychological recovery. Green (1987) found a strong correlation between the secondary stressors that followed the Buffalo Creek dam collapse (e.g., relocation) and the intensity of stress reactions 14 years after the event. Figley and Leventman (1980) have described the stressful experience that were generated by the inappropriate "decompression" which occurred when Vietnam G.I.s were rapidly transported from the battle field to continental USA.

Intervention aimed at reducing such secondary stressors may, therefore, affect the long term consequences of the exposure.

E. The last point concerns the presence of high-risk subjects among affected population. It is well known that only a small proportion of individuals exposed to traumatic stress will experience prolonged sequelae and early behavior might predict further difficulties.

This adds another goal to the early intervention: that of identifying symptomatic patients and providing information about specialized help.

Why indeed early interventions should work at all

Having recommendable goals is not a warranty of effectiveness - and one might ask whether early interventions are capable of changing the course of early and late psychological reactions. The literature on this subject is extremely rare. In particular no prospective data is currently available. Retrospective data - such as that on the effects of early treatment on the development of PTSD in veterans of the Lebanon war seems to indicate that early treatment - and in particular the implementation of a policy of early return to duty, reduces the incidence of PTSD one year after the war. In other words those who return to their units fair better than those who are evacuated to the rear. The main problem with this kind of data is that it is not very different from data indicating that those who are sent back to their homes from the ER of a general hospital are less sick than those who are admitted to the hospital. This "ER dilemma" has not been solved in any study of early intervention that I know of. From a strictly scientific point of view, therefore, and having professed the doctrine of early treatment, I must admit that treating psychological casualties, on the battle field, and expecting it to change the course of their illness is an act of faith. We practice it because we believe it to be good and effective and because we cannot see human being suffer without providing some kind of help.

First example - unit that went into an ambush

Before getting into more theoretical material - I would like to illustrate the entire purpose of this presentation by a 'clinical' vignette - knowing that some of you might have encountered similar events during your service in the Falkland or the Gulf War

> Company A. went straight into the enemy's ambush. Later they would say that their movements must have been spotted during the previous day, but when they moved into the enemy's territory, at night, they were not expecting anyone to be around. Particularly not on the steep and rocky hill which was out of the road and 'of no tactic value'.
>
> It all started in one second. Small weapon fire began coming from a very short range. The commanding officer and the radio operator who was next to him were wounded immediately. A second officer must have ran forward and was killed on the spot. In the dark, however, no one knew what exactly was going on. Fire seemed to come from all directions. Hand grenades were thrown by the enemy and the smartest soldiers heard them coming and warned their buddies. A sergeants took the command. He thought that he had seen a source of fire and instructed the machine gun operator to climb on a heavy boulder and fire back. The man was his as soon as he has reached a firing position. He rolled down, dead, leaving his weapon on the boulder. Other men started firing back, throw hand grenades. One managed

to operate the radio. Than there was silence again. The enemy seemed to have vanished.

While the fire was still going on, the medic ran forward to treat the wounded. He first found the second officer, who happened to have been a school mate, lying on the ground. Still in the darkness, he checked the body for wounds. His hands found a large bleeding hole in the officers' back and another one in the back of his neck. The officer was apparently dead, and the medic, therefore, decided to leave him and treat the commander, who was agonizing, not far away.

Fire was still going on, forbidding the use of light. The medic put a bandage over the commander's open abdominal wound. He kept talking - indeed whispering - to the commander reassuring him and saying that he'll be OK. They must have communicated that way for several minutes - the will never be able to give a good estimate of the time elapsed. When, at last, he could use some light and try to insert an IV line it was all too late. He could not find a vein. The field surgeon, who came running, with the rescue company tried to operate the wounded commander and find a deeper vein, but he died under their observing eyes.

The company left the place in no time. According to the military routine they, than, counted the remaining ammunition and hand grenades, and have undergone a series of commander debriefing, trying to figure up what had really happened. The main witnesses were, unfortunately either dead or wounded. making their way to the hospital. Many questions have, consequently remained unanswered. No one knew, exactly how and why did the second officer reach the point. No one saw him moving ahead. No one knew how was the fire opened and where, exactly was it coming from. Valid information was obtained, regarding the commander's wound: an autopsy revealed a liver injury which caused a slow but fatal bleeding. This information. however, did not reach our medic until quite a time - leaving him with a piercing sense of guilt.

Another company had searched the battle filed on the next morning. They found the body of one enemy soldier. Their grasp of the topography of the hill. however, was very different from that, impressed on the company's soldiers, during the night fight. The two versions never matched completely. Most men were, consequently, left with a sense of uncertainty about actions and misdeeds, which no one cold neither confirm nor deny. Visits to families of the killed in action are customary, and most of the survivors went to see the bereaved parents, where each of them has been asked repeatedly to describe what had happened. By the third day after the incident, therefore, many started to have a 'definite' version of the event. While some were still ready to recognize that their version, shaped by telling the story again and again, was partial others were relieved by a sense of knowing the truth. The individual versions, however, differed from one another. One soldier assumed that the two officers had been killed by the same bullets coming from an 05 machine gun. Others considered this totally impossible. The medic claimed that the company commander had died within 20 to 21. The filed surgeon's count was 45 minutes.

Comparison between versions also became very stressful. Five days after the incident the first wounded men were released from the hospital and joined the others. Among them was the soldier who had been walking at the point with the commander. He seems to have remembered clearly what had happened He said that they had heard a word being said in a foreign language, that consequently the commander had shouted "an enemy in front - open fire" and fired his M-16. This strictly contradicted what everyone

believed to be true until than - namely that the fire was opened be the enemy. As he was telling this new 'truth' one of the survivors left the room, saying that he can't hear any more. His own version was already made up and he found that reshuffling the cards was too upsetting at this point. But event the wounded soldier, who said that he knew everything, could not find any memory explaining the deceased second officer's presence at the point. He never saw him. He just could not have been there! It was, nevertheless 'there' that he had been killed.

Interviewed at this point, some soldiers indicated that they were having nightmares and suffered increased alarm reaction. Others were reconstructing, again and again, their own recollections, trying to make sense of memory gaps and to reconcile paradoxical information.

This company's story illustrates the type of stressful events for which group debriefing is usually recommended.

------Table 1 -------

Semi - chaotic unfolding of the event, uncertainty about sequence of events, time distortion, gaps in information, idiosyncratic reconstruction of meaning, premature closure and concealed distress are, as many military records show, the earmark of stressful exposure.

Going back to theory let us turn now to the question of what and how how can group techniques such as debriefing help changing this scenario.

Looking at the literature there are basically two models for early treatment - one is focused on "sick" individuals and the other on population at risk. While the classical model of intervention in organized exposure to stress, which has been practiced in most western armies since World War I (Salmon, 1919) follows the principles of secondary prevention (i.e., treatment of identified patients within medical facilities) recent research has shown that many trauma survivors develop post-traumatic sequelae without having presented acutely disabling symptoms during the exposure.

Solomon et al. (1987) found that 16% of 386 combat veterans of the 1982 Lebanon War, who had not sought treatment for psychological effects of the war, suffered from diagnosable PTSD one year later. Similarly, despite of the low number of identified stress casualties during the Vietnam War (Bourne, 1969, Ingraham & Manning, 1986) a substantial number of veterans developed PTSD in the succeeding years (e.g., Kulka et al. 1989). Data on delayed PTSD among Israeli veterans of the Lebanon War has, similarly, shown that 90% of these patients have been suffering since the war without seeking specialized help (Solomon et al. 1989).

Thus, early intervention that focuses on identified patients (that is those whose performance in combat had already declined) addresses only part of the population at risk.

These findings argue in favor of implementing new modes of intervention, conceived as primary prevention and addressing all the exposed population. Debriefing is one such method.

Past and present forms of debriefing

Debriefing protocols differ in their goals, their content, and their techniques. Various goals have been set by different authors including working-through emotional overload (Mitchell,1981,1983), improvement of group cohesion teaching coping skills (Bergman & Queen, 1986), initiation and disengagement from 'disaster role' (Raphael, 1986) and detection of symptomatic individuals (Mitchell, 1983).

Accordingly, various aspects of the exposure have been suggested as focal points for the sessions. Among these are the factual reality of the event (Marshall,1944), the emotional reactions of individuals exposed (e.g., Mitchell,1983), post-event elaboration and attribution (e.g., Bergman 1986) and residual symptoms (e.g., Mitchell, 1983).

Various techniques have been applied including cognitive rehearsal (Marshall), ventilation, support and resource mobilization (Mitchell, 1983), education (Raphael, 1986) and active counselling and teaching (Wagner 1979).

In spite of these differences all forms of debriefing have a number of elements in common. Debriefing usually follows a traumatic event immediately after its termination. It is usually practiced at the site of the action or within the same organizational setting in which the exposure took place. Debriefing is conducted in groups defined by the fact of exposure to the trauma. It always involves a degree of cognitive review of the event. It includes verbal and emotional exchanges between individuals and therefore results in the sharing of various levels of information and most often in reframing previous views and learning new information.

A. Task-Oriented Debriefing

This form of debriefing is widely practiced by military commanders - in fact by a host if institutions - as a tool for gathering information and learning lessons.

Military and non-military institutions, such as the FBI, fire departments, research teams, and business corporations use a variety of debriefing sessions named 'team meetings' 'problem solving meetings' etc.. for such goals.

Although designed as purely instrumental, these forms of debriefing might have a substantial psychological impact on participants

They are part of the institution's culture, acquire a quality of rituals and mobilize a fair amount of emotion. Moreover, these 'institution-oriented' sessions fulfill a number of functions that practitioners of psychological debriefing may want to achieve: they attribute a formal meaning to the event (through interpretations, comments, citations or rewards) and integrate it into the general framework of the institution. At the same time these rituals reaffirm the institution's role as a source of meaning and a frame of reference for all action. Fact - finding debriefing, however, are often flawed by focusing on issues that are psychologically irrelevant for the individual (e.g., problems with a type of ammunition in combat), teaching lessons, moralizing and blaming.

Professionals who, following a traumatic event, plan a psychological debriefing in such institutions (e.g., police, fire departments) should be aware of the existence of such routines, recognize their practical and symbolic value and, when possible, create a link between their own interventions and these routines.

C. Psychological Group Debriefing

Psychological group debriefing are those interventions that deliberately try to mobilize psychological processes that are expected to positively affect the traumatized individual or the group. Several theories provide a conceptual model for psychological debriefing.

Ventilation and abreaction

According to the classical psychoanalytic theory ventilation and abreaction are the major healing processes related to the economy of emotions. Their facilitation during debriefing may help the individual 'discharge' his/her overwhelming internal tension and prevent the development of symptoms.

Group relatedness

The role of group processes in affecting the damaged psychic structures is more complicated: the basic premise is that during group events several intrapsychic processes and structures are conveyed to the group. The group, therefore, becomes the source of the individual's stable identity and the site of his/her projected invulnerability and magical protection. When trauma results in a rupture of the individual's links with the group, it may cause an intolerable sense of isolation, disarray and helplessness (Dasberg, 1976). Debriefing may correct these effects by reestablishing the mutual exchange between the individual and the group.

Verbalization

Derived from the psychoanalytic theory, is Van der Kolk's observation that traumatic memories are often stored as images rather then as words. According to this author this "iconic" mode of memory-storage precludes further processing and working through - for which the symbolic function of the language is required. Verbalization of recent traumatic experience is, accordingly, an important healing principle. A recent study by Pennebaker and Susman (1988) supports the idea that failure to disclose traumatic experiences has deleterious effects on health.

Grief

Horowitz's (1976) has emphasized the similarities between PTSD and grief. The intrusive components of normal grief (Lindemann, 1944) are, according to Horowitz, aborted and repeated endlessly in PTSD. This view emphasizes the therapeutic role of facilitating grief processes during debriefing.

Reappraisal

Lazarus' model of appraisal, emphasizes the role of cognitive schemata in modulating stress reactions. Accordingly a group process that leads to higher modes of appraisal may buffer the effects of stress on the individual.

Memory fixation

Related to the cognitive theory of emotion are E. Lottus (1979) studies of post-event recollections. Her work constitutes an important, and often ignored, contribution to the area of traumatic stress: In a series of studies of eyewitness' recollections this author has shown that memories can be transformed by presenting the subject with new information shortly after the event. Recollections could be either enhanced or compromised, and new objects could be introduced to the subjects' recollections by presenting appropriate information. Substituting, for example, the word "smash" to "hit" after having presented subjects with a movie of a car accident.could modify the visual image recalled a week later (p.78). Such modified memories persist for years - constituting the subjects 'real' memory of the event. The relevance of Loftus' work to the area of trauma is central: it shows a possible connection between the content of a traumatic recollection and the events that follow the trauma.

It also supports the role of early intervention such as debriefing in shaping the way in which the event will be remembered.

Social support as buffer of stress reactions

Theories of social support provide a straight justification for group debriefing, conceived as a way of enhancing social interactions.

One group phenomena, which often occurs spontaneously, should be considered as a potential risk: Scapegoating and outward oriented rage are frequently encountered in groups of victims, where they justify all kinds of retaliatory fantasies or activities, while, at the same time eternalizing and often glorifying the status of having been a victim. The literature shows that these negative group experiences were at the origin of atrocities, anti-democratic and inhuman behavior on the part of previously-victimized groups

Another effect of such merged identity is to prevent individual recovery. The late Hillel Klein, an Israeli psychoanalyst and Holocaust survivor contrasted collective identities (such as "holocaust survivors") with individual identity. Collective identity, which originally serves as a buffer against stress, might later impair survivors' ability to mourn their own personal losses and to come to terms with their grief. Debriefers should, therefore, be aware of the necessity to conduct their intervention so that it opens access to individual grief - often at the expenses of merging tendencies within the group.

Among the numerous clinicians who have used post-event debriefing for the purposes of therapy or prevention, the works of B. Raphael (1986) and J. Mitchell (1982,1983) are most widely cited.

Following a successful debriefing session of a volunteer rescue team after involved in rail disaster. B. Raphael (1986) formulated guidelines for debriefing teams of helpers involved in disaster rescue.

Raphael's technique, as it transpires from the narrative of a debriefing session is that of a free discussion: "Sitting around in a group and drinking beer they discussed with the consultant (and in a half joking fashion) a wide range of topics: the frustration of their role and sense of helplessness; the fear several had about dying themselves in the narrow space; the terror and revulsion at all these deaths... the post traumatic stress reactions of intrusive images, nightmares and fears, the difficulties sharing the experience with their families.... As the evening progressed the consultant helped these workers to accept the naturalness of their fears and regain their sense of mastery through discussion, release of feelings and externalization of their experience." (Raphael 1986, p. 255.)

The goal is primarily preventive: "to help the workers deal with the inevitable stresses so that problems do not arise subsequently". The healing theory is straightforward: "The experience is given a cognitive structure and the emotional release of reviewing it helps the worker to a sense of achievement and distancing" (p.286). As with other authors, the follow up data is anecdotal - although positive, and the immediate relief unmeasured.

Similar to B. Raphael's method, the Critical Incident Stress Debriefing method (CISD), was developed by J Mitchell (1981, 1982, 1983) and has been applied to several groups of rescue workers (Melton, 1985; Mitchell, 1986). The CISD's protocol comprises a series of formal phases through which various aspects of the traumatic exposure are explored and worked through by the group.

Ventilation, mobilization of social support as well as education and identification of symptomatic individuals are used. The focus is on individuals and their reactions and not on the group as such. The evidence concerning the outcome of the intervention is anecdotal, however enthusiastically positive. Follow up data is lacking. However the explicit structure of Mitchell's protocol has allowed a number of health professionals (e.g., Melton, 1985) to conduct similar debriefing sessions.

Other reports of psychological debriefing generally follow the same lines (Dunning & Silva, 1980, Wagner 1979, Bergman & Queen, 1986, Griffin 1987; Jones 1985) - particularly with their focus on individuals and their needs rather than on enhancing group cohesiveness and resilience.

B. Historical Group Debriefing

The method of historical group debriefing was developed, during World War II, by the the chief historian for the US army Brigadier General SLA Marshall. The method was applied to a large number of combat units during World War II, Korea and Vietnam wars. The principal goal of Marshall's debriefing was to gather historical facts. Despite of that, the debriefing sessions had, according to Marshall, a profound psychological impact on the participants that he liked to call "a spiritual purge" SLA Marshall left an extensive documentation of his debriefing method including books transcripts of lectures and field notes which I had the chance to study at the US Army Institute of Military History in Carlisle, PA.

Marshall's focal interest were the psychological factors which underlay human performance in combat. He describes the modern battle field as poor in positive information and full of ambiguous cues: The enemy is rarely to be seen, sources of danger and threat are hidden. A soldier's capacity to overcome his fears depends, therefore, on his ability to "feel the presence of others" and maintain a sense of belonging to a group (Marshall, 1947). Marshall was also aware of the individual's inability to identify and make sense of the overall pattern of a combat event in which he participated. His writings contain many descriptions of commanders and soldiers acting and making decisions on the basis of partial information and inaccurate assumptions. Marshall consequently believed that the historical truth of combat could only be accessed through reconstruction of group narratives. His method of historical group debriefing was designed to restore such comprehensive description.

Marshall's debriefing sessions took place on the battle field as soon as possible after the action.

All the survivors of the battle were present - but no others were allowed to assist.
The battle outline and the specific role played by the unit to be debriefed, as well as technical information (e.g., ground, weather, manpower, weapons, food, ammunition, etc...) are learned in advance. Understanding the factual reality is as sine-qua-non for analyzing the material discussed by the group during the session.
The sessions opened by informing the group of the procedure and its goals. The instructions defined the group's task as "to describe the combat with all the possible details". Witness were encouraged to speak and to share their experiences with the whole group.
For the duration of the session, military ranks were set aside. Testimonies were, therefore, weighed according to their pertinence in understanding the course of the operation and not to the rank of the witness. *"Here you are all equal witness: For the time being we all stand on the same ground. If you hear any man present, whatever his rank, say something which you think is incorrect....it is your duty to stand up and speak your piece"*
The reconstruction of the battle followed a "strict chronological path" and uncovered the events in sequential order. This helped focus the discussion on factual reality rather than interpretation. The 'factual reality, however, included thoughts, assumptions feelings and subsequent decisions and actions. All the available information on each stage of the battle was exhaustively collected from all the witness. *"It is often found that the key to all that occurred may be some fact known to only two or three members of the company which they themselves considered to be of minor import"*. The "group's spirit" was also part of the factual reality. Fatigue, malnutrition and anticipatory intuitions that preceded the engagement were recorded and studied as potential causes of behavior during the action.
Tolerance of contradictory or ambiguous information was the rule. Contradictory statements lead to encouraging further clarification and looking for more details. Premature conclusion and closure was systematically avoided. Additional information was never to be discredited on the basis of earlier statements: *"The record should not be regarded as closed at any time"*.

With regard to time - Marshall's debriefing sessions are the longest described in the literature. Debriefing sessions were continued until the whole picture was obtained. Marshall estimated that seven hours were needed to debrief one fighting day. Allegedly some debriefing sessions took three working days. This attitude towards time (i.e., the unfolding of the process determines its length) is similar to that of traditional psychodynamic therapy, where the length of the treatment is determined by its course. This might have helped to generate a group process characterized by openness and lack of pressure.

Contrasting sharply with psychological group debriefing, the soldiers' emotional reactions are not openly addressed during the sessions. Emotions and affects are enquired about, accepted with understanding and deference, but not commented upon. In our practice of Marshall type of debriefing we found that this attitude is perceived, most of the time, as being respectful for the soldiers' integrity - while the opposite trend to comment, encourage and interpret is likely to be perceived as being intrusive and contemptuous.

In a subtle way, once you turn healthy individuals, who had just endured a situation over which they had little control into active participants, shaping the meaning of their recent experience, you seem to be doing just enough. Stated in psychological terms I would submit that soldiers in active combat zone have only a limited capacity to psychologically regress and accept help from soothing, motherly-protective figures - which is a good enough reason to avoid putting oneself in such a posture.

The last point concerns the role of natural leaders in debriefing. Company commanders were, in fact, often invited to take the lead and conduct the interview. As he said "If he is fit to lead them in battle, he is fit to lead them in reliving the battle experience." In practice we have observed that commanders (that is second lieutenants, and captains) - what a surprise - are sensitive and open minded human being, who carry an additional burden of responsibility and often feel isolated and lonely. Once the session is on, and

after a short period of modeling, they might endorse the new 'democratic' game and even enjoy it. Indeed.they are eager to 'tap their soldiers' mind' and learn about their feelings and thoughts.

What does one learn from debriefing
Example of the "good" ambush
This example shows that despite of a very good outcome of a short combat action, Marshall's debriefing has revealed that information was not correctly perceived by many of the soldiers, that actions were rather badly coordinated but that, at the same time, this level of uncertainty finally revealed itself as very productive - as it forced many of the unit members to take initiative and find solutions to problems - which finally resulted in swift and successful action. A point is made that had anything turned wrong in this fight (which was almost the case) - the same 'successful' events that could have been used as arguments to blame commanders and soldiers in a catastrophic result.
Marshall thought that disorganization of the information was bound to create panic and fear among troops We found, however that the information is always disorganized, unequally distributed, and almost never reaches all the addressees. Moreover - once the information has reached a participants it is likely to be interpreted, compared with one's own observation and given a practical meaning (i.e., lead to decision and actions) in a way that is hardly predictable.
 We submit therefore that
1. Disorganization (of the information) is constantly present in infantry groups during combat.Now is the (disorganized) information a "noise" , an adverse phenomenon that one must try to reduce as much as possible? Experience shows that lack of information (uniformity) could be as productive as clear information (uniformity).Moreover - experience indicates that non-chaotic combats are the exception rather than the rule.
Thus throughout the centuries wars have been won and lost by engaging in activities which, at their peak, contained a large element of confusion. I. A degree of disorganization essential for the good functioning of groups in combat.
(another possibility is to look at the disorganization as a degree of freedom, the statement than becomes:
A degree of (individual, subgroup) freedom is essential to make (individuals or groups) function in combat.
II. An illusion of integrity is equally needed - as to keep subjects motivated and ready to exercise their (relative) freedom in combat.
Otherwise stated
Straight comprehension of the degree of randomness (arbitrariness) of a combat-event is bound to create panic and decrease performance
III. Definite meaning and definite structure are attributed, post factum.
IV. Good structure of meaning seems necessary to the resolution of the mental event that follows the real event.
Otherwise stated

Conclusion regarding the applicability of debriefing method after combat
Soldiers are eager to talk. In fact they do talk - whether debriefed or not.
Non-critical environment is rarely provided by the military.
Once given a chance, soldiers readily open-up and share their views and experiences.
A stable version of the event is likely to be created within a week or so.
Despite of that 'version' most soldiers still have questions.
Many of these questions are apparently informative. The information requested and received, however, projects on deeper emotional layers.
Debriefing can become a recovery experience - provided that certain rules are observed.

The major such rule is to correctly perceive the particular psychological situation of combat soldiers - and in particular their being, psychologically, both dependent and independent individuals.

They are independent by education, cultural norms and free-thinking tradition. Moreover, in modern armies they are often encouraged to speak out and think.

They are, at the same time, heavily dependent on the group to which they are affiliated, its norms, its modes of expression, its hierarchy and its internal structure.

Through training and war experiences, each of them had just too much invested in his of her affiliation for it to be challenged without extremely painful emotions.

Challenging accepted truth or established authority is, therefore, likely to create emotional and cognitive dissonance to a degree that might become intolerable for the group.

When such dissonance occurs, the group is likely to reject the new input and stick, more than before, to the old and accepted.

Soldiers, to summarize, can rarely afford to challenge their affiliation.

They therefore won't let a stranger lead them into a new truth or substitute himself to their natural commanders.

It is, therefore, in that narrow path, between providing new input and respecting existing structures (including concrete structures, structures of meaning and emotional structure) that effective debriefing can take place.

Table 1 "Earmarks" of Traumatic Combat Event
Semi-chaotic unfolding
Uncertainty about facts
Time distortion
Gaps in information
Idiosyncratic reconstruction of meaning
Premature closure of narrative
Negative emotions
Concealed distress

Table II: Disorganization in Combat - Friend of Enemy?

A degree of Chaos is always present in combat events.

Randomness and Disorganization are not just "noise." They are essential for the good functioning of individuals and groups in combat.

Randomness and disorganization are productive because they leave enough room for initiative and freedom.

Randomness and disorganization are counter-productive when they no longer provide a framework for assumptions and actions.

Despite of this semi-chaotic unfolding of combat, soldiers need an illusion of integrity order to exercise their (relative) freedom and fight.

Straight comprehension of the degree of randomness of combat is bound to create panic.

Only after its termination can a definite-meaning and an organized-structure be attributed to the event .

Good structure of meaning is necessary for the resolution of the mental event that follows combat.

Bar-On, R. Solomon, Z. Noy, & S. Nardi, C. (1986). The clinical picture of combat stress reaction in the 1982 Lebanon War: Cross war comparison. in Milgram N (ed.) <u>Stress and Coping in Times of War</u>. Brunner/Mazel, New York, pp.97-102

Baum, A. Gatchel, R. J.& Scaeffer, M. A. (1983) Emotional behavioral and physiological effects of chronic stress at the Three Miles Island. Journal of Consulting and Clinical Psychology 51, 565-572.

Bergman, L. H. & Queen, T. (1986) Critical Incident Stress: part 1. Fire Command, April pp. 52-56

Birenbaum, F. Copolon, J. & Scharff, I. (1976) Crisis intervention after a natural disaster. In R. H. Moos (ed.), Human Adaptation: Coping with Life Crises. Heath and Company, Lexington.

Bloom, B. L. (1985) Stressful life event theory and research: Implications for Primary Prevention. NIMH/ADAMHA, Rockville, MD. Chapter 6 concluding Summary, p. 98.

Bourne, P.G. (1978) Military psychiatry and the Viet Nam war in perspective. in Bourne P.G. (editor) The Psychology and Physiology of Stress New York Academic Press. 219-236

Cohen, R. E. and Ahearn, F. L. (1980) Handbook of Mental Health Care for Disaster Victims. Johns Hopkins University Press, Baltimore, MD.

Cohen, R.C. (1976) Post disaster mobilization of a crisis intervention team: The Managua experience. In H. G. Parad, H. L. P. Resnick and L. P. Parad (editors.), Emergency and Disaster Management: A Mental Health Handbook. Charles Press.

Dasberg, H. (1976) Belonging and loneliness in relation to mental breakdown in battle. The Israel Annals of Psychiatry and Related Disciplines 14: 307-321

Dunning, C. Silva M. (1980) Disaster-induced trauma in rescue workers. Victimology 5, 287-297.

Fest, J.C. (1973) Hitler. Ullsteing Verlag Frankfurt, pp.171-193

Figley, C. & Leventman, S. (1980) Strangers at Home, Vietnam Veterans since the war. New York, Praeger Publishers,

Gal R. A portrait of the Israeli Soldier. Greenwood Press, Connecticut.

Green, B. L. Grace, M. C. Lindy, J. D. Titchener, J. L., & Lindy, J. G. (1983) Levels of functional impairment following a civilian disaster: The Beverly Hills Supper Club fire. Journal of Consulting and Clinical Psychology 51, 573-580.

Green, B.L. (1986). Conceptual and methodological issues in assessing the psychological impact of disaster. In: B. J. Sowder & M. Lystad, (Eds.). Disasters and Mental

Health: Contemporary Perspectives and Innovations in Services to Disaster Victims. American Psychological Association: Washington, D.C. P.191-208

Green, B.L. (1987). Long term consequences of man made catastrophes. In R. J. Ursano and C. S. Fullerton, (editors.), Individual Responses to Disasters. Uniformed Services University of the Health Sciences, Bethesda, MD.

Greenbeg, M.S. & Van der Kolk B.A. (1987) Retrieval and integration of traumatic memories with the "painting cure" in B.A. Van der Kolk (ed) Psychological Trauma. American Psychiatric Press, washington, pp. 191-216

Griffin, C.A. (1987) Community disasters and Post Traumatic Stress Disorder: a debriefing model for response. in Williams T (editor) Post Traumatic Stress Disorders: a Handbook for Clinicians American Disabled Veterans Publication, Cincinnati.

Hearst N Newman TB Hulley SB Delayed effects of the military draft on mortality. New Engl. J Med 314:620-624, 1986

Helzer, J. E. Robins, L. N. & McEnvoi, L. (1987) Post-traumatic stress disorder in the general population. New England Journal of Medicine 317:1630-1634.

Horowitz. M. (1976) Stress Response Syndrome. Aronson.

Hytten K. & Weisaeth L. (1989) Helicopter crash in water: effects of simulator escape training. Acta Psychiatrica Scandinavica, (Supplement 355) 73-78.

Ingraham, L. & Manning, F. (1986) American Military Psychiatry in Gabriel RA (editor) Military Psychiatry. Greenwood Press, New York. pp 25-65

Jones, D. R. (1985) Secondary disaster victims: the emotional impact of recovering and identifying human remains. American Journal of Psychiatry 142:303-307.

Kaylor, J.A. King D.W. & King L.A.(1987) Psychological effects of the military service in Vietnam: a meta-analysis. Psychological Bulletin 102:257-271

Klein. H. & Kogan, I. (1987) Life under existential stress 40 years after the Holocaust, Therapeutic Aspects. Sihot, Israel Journal of Psychotherapy, 1, 94-98.

Krystal, H. (1978) Trauma and affect. Psychoanalytical Study of the Child. 33, 81-116.

Kulka RA, Schlenger WE, Fairbank JA, Hough RL, Jordan BK, Marmar CR, Weiss DS. Trauma and the Vietnam War Generation: Report of Findings from the National Vietnam Veterans Readjustment Study. New York: Brunner/Mazel, 1990.

Kulka, R.A., Schlenger, W.E. Fairbank, R.L. Hough, R.L. et al. (1989) Trauma and the Vietnam War generation. Brunner Mazel (Psychosocial series # 18) New York.

Lazarus, R. S. & Folkman, S. (1984) Stress Appraisal and Coping. Springer.

Lazarus. (1982) The costs and benefits of denial. In Bereznits s (ed) The Denial of Stress. International University Press, New York, pp. 1-30

Lifton, R. J. (1973) Home From The War. Basic Books, New York.

Lindemann, E. (1944) Symptomatology and management of acute grief. American Journal of Psychiatry 101:141-148.

Lindy, J. D. (1985). The trauma membrane and other clinical concepts derived from psychotherapeutic work with survivors of natural disasters. Psychiatric Annals 15, 153-160.

Lindy, J. D., & Grace, M. (1986) The recovery environment: Continuing stressor versus a healing psychological space.in Sowder J & Lystad M Disasters and Mental Health: Contemporary Perspectives and Innovations in Services to Disaster Victims. pp. 147-160. American Psychiatric Press, Inc.: Washington, DC

Lindy, J. D., Grace, M. C., & Green, B. L. (1981). Survivors: Outreach to a reluctant population. American Journal of Orthophsychiatry 51, 468-478.

Loftus, E.F. (1979) Eyewitness testimony. Harvard University Press. Cambridge Mass.

Marshall, S. L. A. (1944) Island Victory. Penguin Books.

Marshall, S. L. A. (1947) Men Under Fire: The Problem of Battle Command in Future War. William Morrow.

Marshall, S. L. A. (1953a) The River and the Gauntlet. Morrow.

Marshall, S. L. A. (1953b) Pork Chop Hill. Morrow, 1956.

Marshall. S. L. A. (1962) Night Drop, The American Airborne Invasion of Normandy. Little Brown.

Melton, C. (1985) The days after: Coping with the after effects of the Delta 1-1011 crash. Firehouse, December pp.49-50.

Mitchel, J.T. (1986). Critical incident stress management in R. Minred (Ed.) Response! 5, 24-25.

Mitchell, J. T. (1981) Emergency response to crisis: a crisis intervention. In Guidebook of Emergency Service Personnel. R. J. Brady Co..

Mitchell, J. T. (1982) Recovery from rescue. Response Magazine, Fall Issue 7-10.

Mitchell, J.T. (1983) When Disaster Strikes...Journal of Emergency Medical Services, 8: 36-39.

Pennebaker, J. W. Susman J. R. (1988) Disclosure of trauma and psychosomatic processes. Social Science and Medicine, 26, 327-332.

Quarantelli, E. L. (1986) Community Responses to Disaster. In: B. J. Sowder & M. Lystad, (Eds.). Disasters and Mental Health: Contemporary Perspectives and Innovations in Services to Disaster Victims. P. 169-179, American Psychological Association: Washington, DC

Raphael, B. (1986) When Disaster Strikes. Basic Books, New York pp 222-244.

Raphael, B. Singh, B. Bardbury, L. & Lambert, F. (1983) Who helps the helpers: the effect of a disaster on the rescue workers. Omega, 14: 9-20.

Rundell, J. R., Ursano, R. J., & Holloway, H. C. (1989). Psychiatric responses to trauma. Hospital and Community Psyciatry, 40, 68-74.

Salmon, T. (1919) The war neurosis and their lesson. New York State Journal of Medicine, 59, 933-944.

Shalev, A. Bleich, R.J. Ursano Posttraumatic stress disorder: somatic comorbidity and effort symptoms. Psychosomatics, 31:197-203,1990

Shatan, C.F.(1974) Through the membrane of reality: impacted grief and perceptual dissonance among Vietnam Veterans. Psychiatric Opinions, 11, 6-15.

Solomon, S. D. (1986) Enhancing social support for disaster victims In: B. J. Souder & M. Lystad (Eds.). Disasters and Mental Health: Contemporary Perspectives and Innovations in Services to Disaster Victims American Psychiatric Press: Washington, D.C. pp. 115-129.

Solomon, Z., & Benbenishty, R. (1986) The role of proximity, immediacy, and expectancy in frontline treatment of combat stress reaction among Israelis in the Lebanon War. American Journal of Psychiatry 143, 613-617.

Solomon, Z., Schwarzwald, J. & Mikulincer, M. Frontline treatment of Israeli Soldiers with combat stress reactions. American Journal of Psychiatry 144, 448-454.

Solomon. Z, Kotler, M. Shalev, A. & Lin, R. (1989) Delayed post traumatic stress disorder. Psychiatry, 52, 428-436.

Spiller, R.J. (1988). S.L.A. Marshall and the ratio of fire. The Royal United Service Institute for Defense Studies Journal 133, 63-71.

Stratton JG Parker DA Snibbe JR Post-traumatic stress: study of police officers involved in shootings Psychol Rep 1984;55:127-131

The centers for Disease Control Vietnam Experiences Study. Health status of Vietnam veterans, II. Physical health. J Am Med Assoc 259:2708-2714, 1988

Ursano RJ Holloway HC Jones DR Rodriguez AR Belenky GL Psychiatric care in the military community: family and military stressors Hosp Community Psychiatry 1989;40:1284-1289

Wagner, M. (1979) Airline disaster: a stress debriefing program for police. Police Stress, 2: 16-20.

Weissaeth L. (1989) A study of behavioral responses to an industry disaster. Acta Psychiatrica Scandinavica, (Supplement 355), pp. 13-24.

"Soldiers are eager to talk,
their memory is good,
they do so better when together,
in groups"
S.L.A. Marshall, Island Victory, 1944

Debriefing Following Traumatic Exposure

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Outline

Debriefing is a group-oriented intervention in which the major elements of an event are reviewed by the participants, shortly after its termination. Debriefing has been recommended by several authors as stress management technique, suitable for groups exposed to traumatic events, and has been practiced, as such, by several rescue organizations (Dunning & Silva, 1980; Wagner, 1979; Raphael, 1986; Mitchell, 1981: Bergman & Queen, 1986; Griffin, 1987; Jones, 1985). Although intuitively helpful, the structure of this technique, its goals and its mechanism of action have not yet been defined. A systematic description is needed in order for this technique to become an object of scientific scrutiny and interest. This chapter reviews several debriefing protocols, outlines the principal dimensions of this method, and suggests a framework for future research.

Introduction

Disasters, wars and traumatic events regularly result in immediate and long-term psychological changes among the individuals affected, ranging from the most pervasive forms of post traumatic stress disorder (PTSD) to a variety of positive learning experiences.

The immediate reactions to traumatic stress include all possible forms of human suffering, along with massive attempts to cope with the effects of the exposure. A wide variety of symptoms has been documented including paralyzing anxiety, cognitive disarray, dissociative and conversion reactions, psychological and physiological depletion, and emotional numbing (Bar On et al., 1987; Weissaeth, 1989; Krystal, 1978; Green et al., 1983). These immediate reactions constitute an urgent appeal for specialized care, indeed for "every comforting human response" (Raphael, 1986, p.247) capable of reducing the suffering involved. Such is the primary goal of all early interventions that follow trauma.

Typical to this stage are the mobilization of social resources and the spontaneous rescue efforts of both professionals and non professionals (Quarantelli, 1986). These efforts draw into the circle of the traumatic exposure other members of society who may themselves become victims. Relatives and peers of the victims may become secondary victims and react to their real and symbolic losses in similar ways (Jones, 1985, Ursano; Wright, this volume?).

Long-term studies of exposed populations (e.g., Green, 1987, Solomon et al.1987; Kulka et al, 1989) show that a substantial number of survivors will suffer from after effects for prolonged periods. PTSD is the most widely recognized consequence of trauma but is far from being the only one: a variety of psychiatric disorders including depression, dysthymia, phobias, dissociative disorders, alcohol and drug abuse has been documented, along with profound personality changes, increased physical morbidity, high rates of mortality and an uncontrolled trend to re-enact the trauma by repeated self-exposure or victimization of others. These long-term effects add another goal to early treatment efforts - namely the prevention of post traumatic morbidity.

Exposure to trauma may occur individually or in randomly assembled groups. For some populations (e.g., police, fire departments and armies) such exposure is predictable, organized, and part of professional duty. Despite of the protective role of preparation and training (Hytten & Weisaeth, 1989), such 'organized exposure' produces a substantial number of disabling psychological sequelae among individuals. A variety of stress disorders has been described among fire fighters (McFarlane 1988), rescue workers (Dunning & Silva, 1980; Raphael et al., 1983), and combat veterans (Solomon et al.,

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1987; Helzer, 1987; Kaylor et al., 1987). The traumatic exposure, within the above mentioned institutions, is often repetitive. The prospect of such re-exposure adds a third goal to early intervention: the prevention of burn out, of anticipatory anxiety, and of inadequate reactions to subsequent exposures.

As of today, very little is known about the short-term, let alone the long-term effects of early interventions that follow group-exposure to traumatic stress. Retrospective data, such as Solomon and Benbenisty's (1986) survey of combat veterans of the Lebc on War, which was conducted one year after the war, suggest that early intervention had, in fact, been effective in reducing the incidence of PTSD. Prospective studies are obviously difficult to carry out (e.g., Green, 1986) and are, therefore, unavailable.

Several studies, however, provide a rationale for early intervention and delineate its optimal timing and its target population. The first line of evidence concerns the pathogenic effects of the secondary stressors that follow the traumatic impact and those of the recovery environment (e.g., Lindy & Grace, 1986). Green (1987) found a strong correlation between the secondary stressors that followed the Buffalo Creek dam collapse (e.g., relocation) and the intensity of stress reactions 14 years after the event. Similarly, Baum et al. (1983) consider the ambiguous information which followed the Three Mile Island nuclear leak as a major stressor. Figley and Leventman (1980) have described the stressful experience that were generated by the inappropriate "decompression" which occurred when Vietnam G.I.s were rapidly transported from the battle field to continental USA. Intervention aimed at reducing such secondary stressors may, therefore, affect the long term consequences of the exposure.

A second line of evidence concerns the discrepancy between the population at risk for developing post traumatic morbidity and the scope of the established treatment-strategies. While the classical model of intervention in organized exposure to stress, which has been practiced in most western armies since World War I (Salmon, 1919) follows the principles of secondary prevention (i.e., treatment of identified patients within medical facilities), recent research has shown that many trauma survivors develop post-traumatic sequels without having presented acutely disabling symptoms during the exposure. Solomon et al. (1987) found that 16% of 386 combat veterans of the 1982 Lebanon War, who had not sought treatment for psychological effects of the war, suffered from diagnosable PTSD one year later. Similarly, despite of the low number of identified stress casualties during the Vietnam War (Bourne, 1969, Ingraham & Manning, 1986) a substantial number of veterans developed PTSD in the succeeding years (e.g., Kulka et al. 1989). Data on delayed PTSD among Israeli veterans of the Lebanon War has, similarly, shown that 90% of these patients have been suffering since the war without seeking specialized help

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(Solomon et al. 1989). Thus, early intervention that focuses on identified patients addresses only part of the population at risk.

These findings argue in favor of implementing new modes of intervention, conceived as primary prevention and addressing all the exposed population. They also add another goal to the early intervention: that of identifying symptomatic patients and providing information about specialized help.

Group interventions have been practiced by several authors (Griffin, 1987; Raphael, 1986; Birenbaum, Copolon & Scharff, 1976; Cohen, 1976; Cohen & Ahearn, 1980). Among those group debriefing was particularly recommended for survivors of organized exposure (Dunning & Silva; 1980 Jones; 1985 Mitchell; 1981 Griffin, 1987; Bergman & Queen, 1986; Raphael, 1986). Immediate and long-term beneficial effects of debriefing have been postulated - but with very little systematic evidence (Bloom 1985). This chapter presents a description of several debriefing methods followed by a discussion of the principles of this technique.

Past and present forms of debriefing

A. Task-Oriented Debriefing

Debriefing is practiced by numerous institutions for purposes of gathering information and learning lessons. The Israel Defense Forces, for example, have been systematic in debriefing soldiers and commanders after every mission (Gal, 1986), without ever considering this practice as a psychological intervention. Other military and non-military institutions, such as the FBI, fire departments, research teams, and business corporations use a variety of debriefing sessions named 'team meetings' 'problem solving meetings' etc.. for their own goals.

Although apparently of purely instrumental value and not always related to stressful exposure, such forms of debriefing often become part of the institutional culture, acquire a quality of rituals and mobilize a fair amount of emotion. Moreover, these 'institution-oriented' sessions fulfill a number of functions that practitioners of psychological debriefing may want to achieve: they attribute a formal meaning to the event (through interpretations, comments, citations or rewards) and integrate it into the general framework of the institution. At the same time these rituals reaffirm the institution's role as a source of meaning and a frame of reference for all action.

Professionals who, following a traumatic event, plan a psychological debriefing in such institutions (e.g., police, fire departments) should be aware of the existence of such routines, recognize their practical and symbolic value and, when possible, create a link between their own interventions and these routines.

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B. Historical Group Debriefing

A method of group debriefing following combat exposure was developed, during World War II, by the chief historian for the US army, Brigadier General Samuel Lyman Atwood Marshall (1900-1977) and was applied to a large number of combat units during that war and in Korea and Vietnam. Although primarily aimed at gathering historical data, Marshall's method has resulted, according to its inventor, in profound psychological changes among the soldiers debriefed. By virtue of the extensive documentation left by Marshall it is particularly easy to follow his method, which actually reflects many of the generic components of the more recent forms of debriefing. The following report on Marshall's work is based on the author's study of his field notes at the US Army Institute of Military History in Carlisle, PA..

SLA Marshall served as a reporter in the Korean and Vietnam wars and provided extensive documentation including books, (Marshall, 1953; 1956; & 1962) transcripts of lectures (Spiller, 1980), field and research notes (Marshall Collection at Carlisle, Marshall Collection at El Paso). His book, Island Victory (Marshall, 1944) contains an illustrative account of the development and application of post-combat debriefing and his field notes include several transcripts of debriefing sessions.

Marshall's focal point was the study of the performance of small units in ground combat. He was especially interested in the 'human factor' i.e., those psychological factors that enable men to act, and for groups to maintain their integrity (Marshall, 1947). The modern battle field, according to Marshall, presents the soldier with very little positive information and with many ambiguous cues: infantry soldiers rarely see the enemy, their own buddies are under cover, and the sources of danger and threat (e.g., fire, mines) are hidden. A soldier's capacity to overcome his fears depends, therefore, on his ability to "feel the presence of others" and maintain a sense of belonging to a group (Marshall, 1947). Marshall was also aware of the individual's inability to identify and make sense of the overall pattern of a combat event in which he participated. His writings (e.g., Marshall, 1953a; 1953b) contain many descriptions of commanders and soldiers acting and making decisions on the basis of partial information and inaccurate assumptions. Indeed, he grasped one of the major psychological attributes of traumatic events: their chaotic unfolding in the eyes of individuals involved. Consequently, Marshall believed that the historical truth of combat could only be accessed through reconstruction of group narratives. His method of historical group debriefing was designed to restore such comprehensive description.

Marshall's debriefing sessions took place on the battle field as soon as possible after the action. All the survivors of the battle were present, with the exception of the medically evacuated. Prior to the session, Marshall learned about the battle outline and the specific role played by the unit to be debriefed. Getting acquainted with technical information (e.g., ground, weather, manpower, weapons, food, ammunition, etc...) was considered as sine-qua-non for analyzing the material discussed by the group during the session. The interviewer had to "study all the available maps" and "learn beforehand the larger significance of what the company accomplished - more fully than the company itself" (Marshall 1944, p. 205).

The sessions opened by informing the group of the procedure and its goals. At that point, superiors were often invited to endorse the sessions in front of the group and give it their blessing. The instructions defined the group's task as "describing the combat with all the possible details" and emphasized the significance, for the Army, of learning from the group's experience. Witness were encouraged to speak and to share their experiences with the whole group.

For the duration of the session, military ranks were set aside. Testimonies were, therefore, weighed according to their pertinence in understanding the course of the operation and not to the rank of the witness. "The word of a superior as to what a man (or a group) did should not be allowed to prevail against the direct testimony of the man himself" (Marshall, 1944; p. 204).

A moratorium in time was thus created, in which the hierarchical structure was temporarily suspended: "Here you are all equal witness: For the time being we all stand on the same ground. If you hear any man present, whatever his rank, say something which you think is incorrect....it is your duty to stand up and speak your piece" (Marshall, 1944 p. 206). Spiller (1988) related this aspect of Marshall's method as being a "democratic interpretation of the battle" and "genuinely American" and contrasted it with more traditional ways in which military institutions make sense of combat-events, where the right to interpret and convey meaning is reserved for officers and commanders.

After a short period of modeling by the military historian, company commanders were often invited to take the lead and conduct the interview: "If he is fit to lead them in battle, he is fit to lead them in reliving the battle experience." (1944, p.212). The professional leader, however, was always there to remind the commander not to use the session for teaching lessons and to refrain from expressing opinions on a soldier's conduct during the fight.

The reconstruction of the battle, Marshall insisted, had to follow a "strict chronological path" and uncover the events in sequential order. This structure helped to avoid evasions

and to focus the discussion on factual reality rather than on interpretation. Accordingly, all the available information on each stage of the battle was exhaustively collected from all the witness. "No scrap of evidence is too small to disregard at the time of the inquiry. It is often found that the key to all that occurred may be some fact known to only two or three members of the company which they themselves considered to be of minor import" (Marshall,1944, p. 209).

As a military historian, Marshall was primarily interested in facts rather than opinions. A closer scrutiny reveals, however, that he had a broad concept of what the 'factual reality' was during combat. It included soldiers' thoughts, assumptions and feelings at specific times during the fight and the decisions and actions that followed. It was just as important "to gather the facts on the moral side of war as on the purely physical side" (Marshall, 1944, p. 210). The "group's spirit" was also part of the factual reality. Fatigue, malnutrition and anticipatory intuitions that preceded the engagement were recorded and studied as potential causes of behavior during the action.

Marshall warns future interviewers against discarding any testimony and confronting any witness with disbelief or mistrust: "The interviewing officer should never cut any witness short or disbelieve in any statement" (Marshall, 1944; p. 212). Tolerance of ambiguous information was, consequently, the rule and premature closure was systematically avoided. Contradictory statements lead to encouraging further clarification and looking for more details. Additional information was never discredited on the basis of earlier statements: "The record should not be regarded as closed at any time" (Marshall, 1944, p. 212).

It transpires, therefore, that maintaining the integrity of the process (i.e., encouraging openness and communication) was preferable to rectifying misperceptions and achieving a definite version of the events.

The attitude of the interviewer should be of "warm interest and respectful attention". The interviewer "should be ever ready with praise". "He cannot obtain the interest of the company and its complete participation unless he conducts himself as a student rather than as a teacher".

The death of comrades in combat was of critical importance: "It will be found, almost without exception, that these men (those who had died) played a conspicuous part in the actions and that the living are especially concerned with being exact in relating what did happen to those who were killed " (Marshall, 1944, p. 204). The interviewer had to be particularly sensitive to the way in which the death of comrades affected survivors during the battle and during its reconstruction. The memory of the dead added a dimension of seriousness and truthfulness to the process.

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Marshall's debriefing sessions are the longest described in the literature and have not been replicated by others: Having as a goal the elicitation of highly complex information, Marshall hoped to avoid any time constraints. Ideally, the sessions should have been limited only "by the time it takes to achieve the desired result." Debriefing was, therefore, continued until the whole picture was obtained. Marshall approximated that seven hours were necessary to debrief one fighting day. Allegedly some debriefing sessions took three working days. This attitude towards time (i.e., the unfolding of the process determines its length) is similar to that of traditional psychodynamic therapy, where the length of the treatment is determined by its course, and might have helped to generate a group process characterized by openness and lack of pressure.

Marshall considered the practice of debriefing as fairly simple. He recommended it to commanders - even without formal training. It is clear, however, that he recognized the existence of group resistance and had to deal with it. He described, in fact, a group process which opens with an atmosphere of caution and closure and progresses into openness and enthusiastic participation. With some companies a congenial atmosphere could be established "within ten minutes of the start of an interview" while in other cases, the interviewing officer had to work patiently with the company for a day or longer before the "dam breaks". Marshall also postulated a relationship between difficulties in debriefing and the quality of leadership: a company with poor leaders was harder to engage in debriefing.

As a military historian, Marshall's principal aim was "the dissipation of the fog of combat" i.e., the oral history of the battle. He describes, however, a psychological impact on the group which he labelled "spiritual purge", leading to increased self esteem and relief among soldiers: "For every unit it was a morale-building experience" (Marshall, 1944, p.215), "Far from objecting to being interviewed about their battle experience, the men usually relish it. It comes as a relief and as partial recognition to them."(Marshall, 1944 p. 202)

As far as we know, the emotional reactions of the soldiers to combat on the one hand, and those encountered during the sessions on the other hand were neither elaborated nor reflected upon. Marshall did inquire, however, about emotions and affects: "We asked them not only what they did in the fight but what they actually said and how they felt." Moreover, in a subtle way, he seems to have turned the individuals who had just endured a situation over which they had little control into participants, active in shaping the meaning of their recent experience. This process may have had a powerful emotional effect. Similarly, some degree of emotional ventilation may have been facilitated by the sessions.

Marshall's debriefing technique includes several elements that are common to other forms of debriefing (Table 1). Among these are the timing of the intervention, preparations for the session, respect for the institutional framework along with temporary suspension of some

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of its rules, cognitive reconstruction of the event, tolerance to ambiguous information, integration of grief reactions, use of non-professional yet natural leaders, handling resistance to the process and time constraints. Such elements are, explicitly or implicitly, addressed by all those who apply this technique and affect the course of the intervention and its outcome. In reviewing the more recent methods of psychological debriefing we shall refer to four dimensions that may be derived from these element - namely (a) the way in which the stressor is appraised (b) the goals of the interventions (c) the techniques that are being used and (c) the underlying healing theories.

Insert table I about here

C. Psychological Group Debriefing

Among the numerous clinicians who have used post-event debriefing for the purposes of therapy or prevention, the works of B. Raphael (1986) and J. Mitchell (1982,1983) are most widely cited. The following description of these methods will provide all the necessary elements for our discussion of the generics of psychological debriefing.

Following a successful debriefing session of a volunteer rescue team after the Granville rail disaster (Raphael et al. 1984), B. Raphael (1986) formulated guidelines for debriefing teams of helpers involved in disaster rescue (p. 282-285) (table 2). In these sessions the authors explores various aspects of the rescuers' experience of the event and their responses to it. The description of the original intervention is compelling: "Sitting around in a group and drinking beer they discussed with the consultant (and in a half joking fashion) a wide range of topics: the frustration of their role and sense of helplessness; the fear several had about dying themselves in the narrow space; the terror and revulsion at all these deaths... the post traumatic stress reactions of intrusive images, nightmares and fears, the difficulties sharing the experience with their families, and the fact that they could not unload their feelings because immediately after they have finished their work at the rail disaster their were called out to several road accidents rescue and were still in an alert, aroused state. As the evening progressed the consultant helped these workers to accept the naturalness of their fears and regain their sense of mastery through discussion, release of feelings and externalization of their experience." (Raphael 1986, p. 255.)

Raphael conceives the goal of debriefing as primarily preventive: "to help the workers deal with the inevitable stresses so that problems do not arise subsequently". The setting recommended is that of formal group sessions, and the healing theory is straightforward:

"The experience is given a cognitive structure and the emotional release of reviewing it helps the worker to a sense of achievement and distancing" (p.286). As with other authors, the follow up data is anecdotal - although positive, and the immediate relief unmeasured.

Insert table 2 about here

Similar to B. Raphael's method, the Critical Incident Stress Debriefing method (CISD), was developed by J Mitchell (1981, 1982, 1983) and has been applied to several groups of rescue workers (Melton, 1985; Mitchel, 1986). The CISD's protocol comprises a series of consecutive phases through which various aspects of the traumatic exposure are explored and worked through by the group (table 3). Ventilation, mobilization of social support as well as education and identification of symptomatic individuals are used. The focus is on individuals and their reactions and not on the group as such. The evidence concerning the outcome of the intervention is anecdotal, however enthusiastically positive. Follow up data is lacking. However the explicit structure of Mitchell's protocol has allowed a number of health professionals (e.g., Melton, 1985) to conduct similar debriefing sessions.

Other reports of psychological debriefing generally follow the same lines (Dunning & Silva, 1980, Wagner 1979, Bergman & Queen, 1986, Griffin 1987; Jones 1985) - particularly with their focus on individuals and their needs rather than on enhancing group cohesiveness and resilience.

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table 3

Healing Theories Related to Debriefing
Several theories can provide an explanatory model for understanding the effect of debriefing. From a psychodynamic point of view, trauma is a breach in the psychic apparatus' capacity to process reactive emotions by the available structures (e.g., Benyakar et al. 1989). Consequently both the emotional overload, and the impaired structures should be addressed by the therapist.

From this perspective, ventilation and abreaction are the major healing processes related to the economy of emotions. Their facilitation during debriefing may help the individual 'discharge' his/her overwhelming internal tension and prevent the development of symptoms.

The role of group processes in affecting the damaged psychic structures is more complicated: the basic premise is that during group events several intrapsychic processes

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and structures are conveyed to the group. The group, therefore, becomes the source of the individual's stable identity and the site of his/her projected invulnerability and magical protection. When trauma results in a rupture of the individual's links with the group, it may cause an intolerable sense of isolation, disarray and helplessness (Dasberg, 1976). Debriefing may correct these effects by reestablishing the mutual exchange between the individual and the group.

Derived from the psychoanalytic theory, is Van der Kolk's observation that traumatic memories are stored as iconic recollections rather then as verbal ones (e.g., Greenberg & van der Kolk, 1987). According to these authors, the persistence of iconic storing precludes further processing of the traumatic experience, a process for which the symbolic function of the language is required. Verbalization of recent traumatic experience is, accordingly, an important healing principle. In a similar vein, a recent study by Pennebaker and Susman (1988) supports the idea that failure to disclose traumatic experiences has deleterious effects on health.

Horowitz's (1976) has emphasized the similarities between PTSD and grief. The intrusive components of normal grief (Lindemann, 1944) are, according to Horowitz, aborted and repeated endlessly in PTSD. This view emphasizes the therapeutic role of facilitating grief processes during debriefing.

Finally H. Krystal's (1978) concept of the 'freezing of affect' and passive surrender to threat should also be remembered - particularly with regard to subjects who, during early interventions, are incapable of expressing any emotional reactions and who might require further help.

Two aspect of Lazarus' coping theory are pertinent for understanding the effect of debriefing - that of coping strategies and that of traumatic reappraisal (Lazarus & Folkman, 1984). While the model of appraisal, which emphasizes the role of cognitive schemata in modulating stress reactions, may easily be linked with the practice of debriefing, that of coping styles is more problematic and may indeed challenge the appropriateness of this technique to all subjects involved. According to the first paradigm, a group process that leads to higher modes of appraisal may buffer the effects of stress on the individual. The second model, however, should caution the therapists against further traumatizing those subjects who, by virtue of their coping style are better off when allowed to repress and forget. Research has shown that denial, repression and avoidance are beneficial for a number of subjects (e.g., Lazarus, 1982). These coping mechanisms, however, are much less effective when the subjects are re-exposed - in which case those subjects who seek information fare better than those who avoid it. The prospect of subsequent re-exposure

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should, therefore, be taken in consideration in planning the degree to which the reactions to a traumatic events is worked through during debriefing.

Related to the cognitive theory of emotion are E. Loftus (1979) studies of post-event recollections. Her work constitutes an important, and often ignored, contribution to the area of traumatic stress: In a series of studies of eyewitness' recollections this author has shown that memories can be transformed by presenting the subject with new information shortly after the event. Recollections could be either enhanced or compromised, and new objects could be introduced to the subjects' recollections by presenting appropriate information. Substituting, for example, the word "smash" to "hit" after having presented subjects with a movie of a car accident, could modify the visual image recalled a week later (p.78). Such modified memories persist for years - constituting the subjects 'real' memory of the event. The relevance of Loftus' work to the area of trauma is central: it shows a possible connection between the content of a traumatic recollection and the events that might have followed the trauma. It also supports the role of early intervention such as debriefing in shaping the way in which the event will be remembered.

Theories of social support provide a straight justification for group debriefing, conceived as a way of enhancing social interactions. Two group phenomena, however, should be considered as a warning against simple assumptions concerning the beneficial nature of mobilizing group forces following trauma. These are the possible emergence of a negative group identity and the all too easy merging of individual's identities with that of the group.

Scapegoating and outward oriented rage are frequently encountered in groups of victims, where they justify various kinds of retaliatory fantasies or activities, while, at the same time eternalizing and often glorifying the status of being a victim and leaving the individual with a regressed status of "member of a victimized group". Such an impersonal identity may result in reaffirmation of social bonding to a group that, by virtue of projection and hatred may act-out against real or imagined 'enemies' (Lifton, 1973). The history of Nazi anti-semitism, and in particular the quasi spontaneous emergence of the SA gangs out of survivors of World War I's trenches (Fest, 1973) is only one example of this kind.

Another effect of such merged identity is to prevent individual recovery, as described in a series of clinical studies of the late Israeli psychoanalyst Hillel Klein (e.g., Klein & Kogan, 1987). Having survived a concentration camp himself, Klein warns against the pervasive effect of adopting a collective identity (i.e., "holocaust survivor") as opposed to regaining one's own individual identity. The effacement of personal identities, according to Klein, results in the survivors' inability to mourn their own personal losses and come to terms with their grief. Individuation and emerging from collective identities are, thus, essential for recovery. Debriefers should, therefore, be aware of the necessity to conduct their

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intervention so that it opens access to individual grief - often at the expenses of merging tendencies within the group.

Common elements of debriefing methods

As shown above, debriefing protocols may differ in their goals, their content, and their techniques. Various goals have been set by different authors including working-through emotional overload (Mitchell,1981,1983), improvement of group cohesion (Griffin, 1987), teaching coping skills (Bergman & Queen, 1986), initiation and disengagement from 'disaster role' (Raphael, 1986) and detection of symptomatic individuals (Mitchell, 1983).

Accordingly, various aspects of the exposure have been suggested as focal points for the sessions. Among these are the factual reality of the event (Marshall,1944), the emotional reactions of individuals exposed (e.g., Mitchell,1983), post-event elaboration and attribution (e.g., Bergman 1986) and residual symptoms (e.g., Mitchell, 1983).

Various techniques have been applied including cognitive rehearsal (Marshall), ventilation, support and resource mobilization (Mitchell, 1983), education (Raphael, 1986) and active counselling and teaching (Wagner 1979).

In spite of these differences, many parameters of post-event debriefing overlap in practice. At a very basic level, all forms of debriefing have a number of elements in common. Debriefing usually follows a traumatic event shortly after its termination. It is usually practiced at the site of the action or within the same organizational setting in which the exposure took place. Debriefing is conducted in groups, with individuals who have been exposed to trauma. It always involves a degree of cognitive review of the event and has a factual basis. It includes verbal and emotional exchanges within the group and results in the sharing of various levels of information and most often in reframing previous views and learning new information.

These obvious commonalties allow a formulation of a general framework for studying debriefing based on the following four variables: 1. The nature of the trauma (independent variable); 2. The goals of the intervention (dependent variables); 3. The techniques used (intervention variable); and 4. The inferred mechanism of action of the intervention.

I. The nature of the trauma

Included in this category are those elements that precede the intervention and determine the conditions under which it takes place. They must be taken into consideration in planning, designing, and in analyzing the outcome of debriefing. They comprise attributes of the traumatic event (e.g., duration, type of event etc...); those of the group exposed and debriefed and of the mode of exposure (e.g., passive victims, helpers, perpetrators etc..).

II. Goals of the treatment

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These are behaviors, emotions, cognitive attitudes, and group factors that the intervention intends to change. They can be divided into individual and group effects, and into short-term and long-term effects. Table 4 suggests the variables that may be affected by debriefing.

Insert table 4 about here

III. Techniques used

These variables should clearly reflect the ways in which the intervention is being carried out, and the technical processes allowed. Their description should capture and define those elements of the intervention that are expected to affect its outcome.

IV. Mechanisms of action

Whenever possible, practitioners of debriefing should be explicit about the elements of the trauma that they wish to temper and the corrective aspects of the intervention. Among these are:

1. Emotional Dyscontrol: Disabling affects such as terror, panic, sadness, guilt, sense of failed enactment, numbing and freezing of affect.

2. Cognitive dysfunctions related to the state of increased arousal (e.g., narrowing of the cognitive field, inability to concentrate or shift attention etc..).

3. Shattered cognitive schemata of control, security, invulnerability etc..

4. Loss of the capacity to enjoy rewarding interpersonal contacts

5. "Traumatic Membrane" effect: Perceptual and cognitive dissonance resulting from the subject's inability to disengage from the disaster experience and reestablish a continuity of meaning and experiencing with 'normal' life (Shatan, 1974, Lindy, 1985).

5. Traumatic conditioning effect: Conditioned emotional responses to a variety of cues which may trigger intense negative experiences. Persistence of iconic memories.

6. Impacted grief: The inability to engage in a reparatory process of mourning.

7. Traumatic group effects such as scapegoating, projection, nihilistic and anti-social attitudes.

8. Improper information concerning the event, its outcome and the normal reactions to its occurrence.

Several of these phenomena call for specific interventions, the outcome of which can be measured by psychometric instruments that are currently available (e.g., rating scales of anxiety, intrusion and denial, depression, self efficacy perceived social support etc..). Ideally the goals of debriefing and the techniques that are used should match the healing theory and the outcome measures chosen.

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Conclusion

Despite of a growing number of supporters, of numerous anecdotal reports, and of a strong theoretical rationale, the practice of debriefing must receive further empirical support in order to be accepted by both professional and decision makers involved in stress management. This can only be achieved through empirical research that involves the measure of immediate and long-term effects of this technique. As with other research efforts in the area of trauma this is far from a simple task. Debriefing is, by definition, practiced in situations that are hardly appropriate for research purposes, and one should, therefore, expect numerous difficulties with regard to measuring its effect and using appropriate control groups. At the current state of knowledge, indeed, naturalistic, uncontrolled studies, demonstrating an immediate effect on individuals' symptomatology, distress and well being, may constitute an considerable step forward. The outline suggested in this article is an attempt to systematize the study of this technique and suggest a number of outcome variables that one can use for field studies of debriefing.

Table 1.

Technical Principles of SLA Marshall Debriefing Method

Debriefing is carried out on the battle field.

It should take place immediately after the action.

All the participants take part in the sessions.

All ranks are put aside during the session.

Background information should be learned in advance by the
       interviewers.

Superiors should openly endorse the session in front of the group.

The reconstruction of the event follows a strict chronological order.

All the details of the action should be collected from each participant.

Conflicting information should be tolerated.

Premature closure, early conclusion and teaching lessons must be avoided.

The length of session is limited only by the time needed to obtain the entire narrative of the action.

The participants' emotional reactions & symptoms are not explicitly addressed.

Table 2:

Areas Explored in Psychological Debriefing of Workers and Helpers Following Disasters

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The participants' initiation to disaster role
Subjects' own experience of the disaster
Negative aspects and feelings
Positive aspects and feelings
Relationships with other workers and families
Empathy with others
Disengagement from disaster roles
Integration of disaster experience

Adapted from B. Raphael, 1986

Table 3

Phases of the Critical Incident Stress Debriefing (CISD)

Introductory phase

Facts phase

Thought phase

Reaction phase

Symptoms phase

Teaching phase

Re-entry phase

Adapted from Mitchell, 1983

Table 4

Debriefing: Goals of the Treatment

For Organizations
Improve communication between group members
Enhance group cohesion
Improve readiness for future exposure
Symbolize and attribute meaning to the event
For Individuals
Decrease in overwhelming emotions
Decrease in cognitive disarray
Facilitate emotional disclosure
Enhance the sense of self efficacy
Learn coping skills
Initiate grief process
Legitimize feelings and emotions

References

References

Bar-On, R. Solomon, Z. Noy, S. & Nardi, C. (1986). The clinical picture of combat stress reaction in the 1982 Lebanon War: Cross war comparison. in Milgram N (Editor.) Stress and Coping in Times of War. Brunner - Mazel, New York, pp.97-102.

Baum, A. Gatchel, R. J.& Scaeffer, M. A. (1983) Emotional behavioral and physiological effects of chronic stress at the Three Miles Island. Journal of Consulting and Clinical Psychology, 51, 565-572.

Benyakar, M. Kutz, I. Dasberg, H. & Stern, M. J. (1989) The collapse of structure: a structural approach to trauma. Journal of Traumatic Stress, 2, 431-450.

Bergman, L. H. & Queen, T. (1986) Critical Incident Stress: part 1. Fire Command, April pp. 52-56

Birenbaum, F. Copolon, J. & Scharff, I. (1976) Crisis intervention after a natural disaster. In R. H. Moos (Editor.), Human Adaptation: Coping with Life Crises. Heath and Company, Lexington, pp.394-404.

Bloom, B. L. (1985) Stressful life events, theory and research: Implications for Primary Prevention. NIMH/ADAMHA, Rockville, MD. p. 98.

Bourne, P.G. (1978) Military psychiatry and the Viet Nam war in perspective. in Bourne P.G, (editor) The Psychology and Physiology of Stress. Academic Press, New York, pp. 219-236

Cohen, R.C. (1976) Post disaster mobilization of a crisis intervention team: The Managua experience. In H. G. Parad, H. L. P. Resnick and L. P. Parad (editors.), Emergency and Disaster Management: A Mental Health Handbook. Charles Press.

Cohen, R. E. and Ahearn, F. L. (1980) Handbook of Mental Health Care for Disaster Victims. Johns Hopkins University Press, Baltimore.

Dasberg, H. (1976) Belonging and loneliness in relation to mental breakdown in battle. The Israel Annals of Psychiatry and Related Disciplines 14, 307-321

Dunning, C. Silva M. (1980) Disaster-induced trauma in rescue workers. Victimology 5, 287-297.

Dunning C. (1990) Mental health sequelae in disaster workers: prevention and intervention. International Journal of Mental Health, 19,91-103

Fest, J.C. (1973) Hitler. Ullsteing Verlag, Frankfurt, pp.171-193

Figley, C. & Leventman, S. (1980) Strangers at Home, Vietnam Veterans Since the War. Praeger Publishers, New York.

Gal R. (1986) A portrait of the Israeli Soldier. Greenwood Press, Connecticut.

Green, B.L. (1987). Long term consequences of man made catastrophes. In R. J. Ursano and C. S. Fullerton, (editors.), Individual Responses to Disasters. Uniformed Services University of the Health Sciences, Bethesda, MD pp.39-70.

Green, B.L. (1986). Conceptual and methodological issues in assessing the psychological impact of disaster. In: B. J. Sowder & M. Lystad, (Editors.) Disasters and Mental Health: Contemporary Perspectives and Innovations in Services to Disaster Victims. American Psychological Association: Washington, D.C. pp.191-208

Green, B. L. Grace, M. C. Lindy, J. D. Titchener, J. L., & Lindy, J. G. (1983) Levels of functional impairment following a civilian disaster: The Beverly Hills Supper Club fire. Journal of Consulting and Clinical Psychology 51,573-580.

Greenbeg, M.S. & Van der Kolk B.A. (1987) Retrieval and integration of traumatic memories with the "painting cure" in B.A. Van der Kolk (Editor.) Psychological Trauma. American Psychiatric Press, Washington, D.C. pp. 191-216.

Griffin, C.A. (1987) Community disasters and Post Traumatic Stress Disorder: a debriefing model for response. in Williams T (Editor.) Post Traumatic Stress Disorders: a Handbook for Clinicians Disabled American Veterans Publication, Cincinnati, OH pp. 293-298.

Helzer, J. E. Robin., L. N. & McEnvoi, L. (1987) Post-traumatic stress disorder in the general population. New England Journal of Medicine 317, 1630-1634.

Horowitz, M. (1976) Stress Response Syndrome. Jason Aronson, New York, NY

Hytten K. & Weisaeth L. (1989) Helicopter crash in water: effects of simulator escape training. Acta Psychiatrica Scandinavica, 80, (Supplement 355) 73-78.

Ingraham, L. & Manning, F. (1986) American Military Psychiatry. in Gabriel RA (Editor) Military Psychiatry. Greenwood Press, New York. pp 25-65

Jones, D. R. (1985) Secondary disaster victims: the emotional impact of recovering and identifying human remains. American Journal of Psychiatry 142, 303-307.

Kaylor, J.A. King D.W. & King L.A.(1987) Psychological effects of the military service in Vietnam: a meta-analysis. Psychological Bulletin 102, 257-271

Klein, H. & Kogan, I. (1987) Life under existential stress 40 years after the Holocaust, Therapeutic Aspects. Sihot, Israel Journal of Psychotherapy, 1, 94-98.

Krystal, H. (1978) Trauma and affect. Psychoanalytical Study of the Child. 33, 81-116.

Kulka, R.A., Schlenger, W.E. Fairbank, R.L. Hough, R.L. et al. (1989) Trauma and the Vietnam War generation. Brunner Mazel (Psychosocial series # 18) New York.

Lazarus. (1982) The costs and benefits of denial. In Bereznits S (Editor) The Denial of Stress. International University Press, New York, pp. 1-30

Lazarus, R. S. & Folkman, S. (1984) Stress, Appraisal and Coping. Chapter 2: Cognitive Appraisal Processes. Springer, New York, pp. 22-52.

Lifton, R. J. (1973) Home From The War. Basic Books, New York.

Lindemann, E. (1944) Symptomatology and management of acute grief. American Journal of Psychiatry 101:141-148.

Lindy, J. D., & Grace, M. (1986) The recovery environment: Continuing stressor versus a healing psychological space.in Sowder J & Lystad M (Editors) Disasters and Mental Health: Contemporary Perspectives and Innovations in Services to Disaster Victims. American Psychiatric Press, Inc.: Washington, DC. pp. 147-160

Lindy, J. D. (1985) The trauma membrane and other clinical concepts derived from psychotherapeutic work with survivors of natural disasters. Psychiatric Annals 15, 153-160.

Lindy, J. D., Grace, M. C., & Green, B. L. (1981). Survivors: Outreach to a reluctant population. American Journal of Orthophsychiatry 51, 468-478.

Loftus, E.F. (1979) Eyewitness testimony. Harvard University Press. Cambridge Mass.

Marshall, S. L. A. (1944) Island Victory. Penguin Books, New York.

Marshall, S. L. A. (1947) Men Under Fire: The Problem of Battle Command in Future War. The Infantry Journal Press, Penguin Books, Washington D.C. pp. 201-213.

Marshall, S. L. A. (1953) The River and the Gauntlet. William Morrow & Co. New York

Marshall, S. L. A. (1956) Pork Chop Hill. William Morrow & Co, New York 1956.

Marshall, S. L. A. (1962) Night Drop, The American Airborne Invasion of Normandy. Little Brown, NewYork.

Melton, C. (1985) The days after: Coping with the after effects of the Delta 1-1011 crash. Firehouse, December pp.49-50.

Mitchell, J. T. (1981) Emergency response to crisis: a crisis intervention. In Guidebook of Emergency Service Personnel. R. J. Brady Co. Bowie, MD

Mitchell, J. T. (1982) Recovery from rescue. Response Magazine, Fall Issue 7-10.

Mitchell, J.T. (1983) When Disaster Strikes... Journal of Emergency Medical Services, 8: 36-39.

Mitchell, J.T. (1986). Critical incident stress management in R. Minred (Editor.) Response! 5, 24-25.

Pennebaker, J. W. Susman J. R. (1988) Disclosure of trauma and psychosomatic processes. Social Science and Medicine, 26, 327-332.

Quarantelli, E. L. (1986) Community Responses to Disaster. In: B. J. Sowder & M. Lystad, (Editors.). Disasters and Mental Health: Contemporary Perspectives and

Innovations in Services to Disaster Victims. American Psychiatric Press: Washington, DC pp. 169-179.

Raphael, B. Singh, B. Bardbury, L. & Lambert, F. (1983) Who helps the helpers: the effect of a disaster on the rescue workers. Omega, 14: 9-20.

Raphael, B. (1986) When Disaster Strikes, Basic Books, New York pp. 222-244.

Shatan, C.F.(1974) Through the membrane of reality: impacted grief and perceptual dissonance among Vietnam Veterans. Psychiatric Opinions, 11, 6-15.

Solomon, S. D. (1986) Enhancing social support for disaster victims In: B. J. Souder & M. Lystad (Editors.). Disasters and Mental Health: Contemporary Perspectives and Innovations in Services to Disaster Victims. American Psychiatric Press: Washington, D.C. pp. 115-129.

Salmon, T. (1919) The war neurosis and their lesson. New York State Journal of Medicine, 59, 933-944.

Solomon, Z., & Benbenishty, R. (1986) The role of proximity, immediacy, and expectancy in frontline treatment of combat stress reaction among Israelis in the Lebanon War. American Journal of Psychiatry 143, 613-617.

Solomon. Z., Kotler, M. Shalev, A. & Lin, R. (1989) Delayed post traumatic stress disorder. Psychiatry, 52, 428-436.

Solomon, Z., Schwarzwald, J. & Mikulincer, M. Frontline treatment of Israeli Soldiers with combat stress reactions. American Journal of Psychiatry 144, 448-454.

Spiller, R.J. (1988) S.L.A. Marshall and the ratio of fire. The Royal United Service Institute for Defense Studies Journal 133, 63-71.

Wagner, M. (1979) Airline disaster: a stress debriefing program for police. Police Stress, 2: 16-20.

Weissaeth L. (1989) A study of behavioral responses to an industry disaster. Acta Psychiatrica Scandinavica, 80, (Supplement 355), pp. 13-24.

Group Debriefing following Exposure to Traumatic Stress
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In this paper I would like to present a technique of early intervention in group exposure to traumatic stress aimed at reducing the immediate and the long-term consequences of the exposure. The technique presented - namely 'psychological group debriefing' is being practiced by several institutions at this point, and my presentation will be focused on discussing its 'raison d'etre' and outlining its generic dimensions for further study and research.

I would like to start by a series of trivial statements:

The exposure to traumatic events often results in profound psychological changes among individuals exposed ranging from the most pervasive forms of post traumatic stress disorder (PTSD) to a variety of positive learning experiences.

The immediate reactions to traumatic stress include all possible forms of human suffering, along with massive attempts to cope with the effects of the exposure.   A wide variety of symptoms has been documented including paralyzing anxiety, cognitive disarray, dissociative and conversion reactions, psychological and physiological depletion, and emotional numbing (Bar On et al., 1987; Weissaeth, 1989; Krystal, 1978; Green et al., 1983). These immediate reactions constitute an urgent appeal for specialized care, indeed for "every comforting human response" (Raphael, 1986, p.247) capable of reducing the suffering involved. Such is the primary goal of all early interventions that follow trauma.

Typical to this stage are the mobilization of social resources and the spontaneous rescue efforts of both professionals and non professionals (Quarantelli, 1986). These efforts draw into the circle of the traumatic exposure other members of society who may themselves become victims. Relatives and peers of the victims may become secondary victims and react to their real and symbolic losses in similar ways.

Long-term studies of exposed populations (e.g., Green, 1987, Solomon et al.1987; Kulka et al, 1989) show that a substantial number of survivors will suffer from after effects for prolonged periods.   PTSD is the most widely recognized consequence of trauma but is far from being the only one: a variety of psychiatric disorders including depression, dysthymia, phobias, dissociative disorders, alcohol and drug abuse has been documented, along with profound personality changes, increased physical morbidity, high rates of mortality and an uncontrolled trend to re-enact the trauma by repeated self-exposure or victimization of others. These long-term effects add another goal to early treatment efforts - namely the prevention of post traumatic morbidity.

Exposure to trauma may occur individually or in randomly assembled groups. For some populations (e.g., police, fire departments and armies) such exposure is predictable, organized, and part of professional duty.

effects of early interventions in group exposure to traumatic stress. Retrospective data, such as Solomon and Benbenisty's (1986) survey of combat veterans of the Lebanon War, which was conducted one year after the war, suggest that early intervention had, in fact, been effective in reducing the incidence of PTSD. Prospective studies are obviously difficult to carry out (e.g., Green, 1986) and are, therefore, unavailable.

Several studies, however, provide a rationale for early intervention and delineate its optimal timing and its target population. The first line of evidence concerns the pathogenic effects of the secondary stressors that follow the traumatic impact.   Green (1987) found a strong correlation between the secondary stressors that followed the Buffalo Creek dam collapse (e.g., relocation) and the intensity of stress reactions 14 years after the event. Similarly, Baum et al. (1983) consider the ambiguous information which followed the Three Mile Island nuclear leak as a major stressor. Figley and Leventman (1980) have described the stressful experience that were generated by the inappropriate "decompression" which occurred when Vietnam G.I.s were rapidly transported from the battle field to continental USA. Intervention aimed at reducing such secondary stressors may, therefore, affect the long term consequences of the exposure.

A second line of evidence concerns the discrepancy between the population at risk for developing post traumatic morbidity and the scope of the established treatment strategies. While the classical model of intervention in organized exposure to stress, which has been practiced in most western armies since World War I (Salmon, 1919) follows the principles of secondary prevention (i.e., treatment of identified patients within medical facilities)   recent research has shown that many trauma survivors develop post-traumatic sequels without having presented acutely disabling symptoms during the exposure. Solomon et al. (1987) found that 16% of 386 combat veterans of the 1982 Lebanon War, who had not sought treatment for psychological effects of the war, suffered from diagnosable PTSD one year later. Similarly, despite of the low number of identified stress casualties during the Vietnam War (Bourne, 1969, Ingraham & Manning, 1986) a substantial number of veterans developed PTSD in the succeeding years (e.g., Kulka et al. 1989). Thus, early intervention that focuses on identified patients addresses only part of the population at risk.

Data on delayed PTSD among Israeli veterans of the Lebanon War has, similarly, shown that 90% of these patients have been suffering since the war without seeking specialized help (Solomon et al. 1989). This adds another goal to early intervention that follow trauma - the identification of individuals who despite of being symptomatic continues to function and would not seek help.

These findings argue in favor of implementing new modes of intervention, conceived as primary prevention and addressing all the exposed population. In this interventions.
subjects should be addressed regardless to their diagnostic status
The interventions should be carried out in a non-medical environment
The universal nature of the reactions to trauma (e.g., fear, paralysis, helpless, grief) should be emphasized
Expressions of grief f an anger are emphasized
The boundaries of the institution are, normally preserved

Such interventions have been practiced by several authors (Griffin, 1987; Raphael, 1986; Birenbaum, Copolon & Scharff, 1976; Cohen, 1976; Cohen & Ahearn, 1980).   Among these interventions, group debriefing was

particularly recommended for survivors of organized exposure (Dunning & Silva; 1980 Jones; 1985 Mitchell; 1981 Griffin, 1987; Bergman & Queen, 1986; Raphael, 1986). *Immediate and long-term beneficial effects of debriefing have been postulated - but with very little systematic evidence* (Bloom 1985).

As with many new methods debriefing protocols differ in their goals, their content, and their techniques. Various goals have been set by different authors including working-through emotional overload (Mitchell,1981,1983), improvement of group cohesion (Griffin, 1987), teaching coping skills (Bergman & Queen, 1986), initiation and disengagement from 'disaster role' (Raphael, 1986) and detection of symptomatic individuals (Mitchell, 1983)

Accordingly, various aspects of the exposure have been suggested as focal points for the sessions. Among these are the factual reality of the event (Marshall,1944), the emotional reactions of individuals exposed (e.g., Mitchell,1983), post-event elaboration and attribution (e.g., Bergman 1986) and residual symptoms (e.g., Mitchell, 1983)

Various techniques have been applied including cognitive rehearsal (Marshall), ventilation, support and resource mobilization (Mitchell, 1983), education (Raphael, 1986) and active counselling and teaching (Wagner 1979).

Let me now present with some detail few of the ways in which debriefing has been practiced:

Task-Oriented Debriefing

In its simplest form, debriefing is practiced by numerous institutions for purposes of gathering information and learning lessons. The Israel Defense Forces, for example, have been systematic in debriefing soldiers and commanders after every mission (Gal, 1986), without ever considering this practice as a psychological intervention. Other military and non-military institutions, research teams, and business corporations use a variety of debriefing protocols for their own goals.

Although apparently of purely instrumental value and not always related to stressful exposure, such forms of debriefing often become part of the institutional culture, acquire a quality of rituals and mobilize a fair amount of emotion. Moreover, these 'institution-oriented' sessions attribute a formal meaning to the event and integrate it into the general framework of the institution. At the same time these rituals reaffirm the institution's role as a source of meaning and a frame of reference for all action. Besides reaffirming the institutional framework such session may include substantial amount of learning, preparation for future exposure and verbalization of recollections and affects. The psychological effect of such sessions are yet to be evaluated.

Professionals who, following a traumatic event, plan a psychological debriefing in such institutions (e.g., police, fire departments) should be aware of the existence of such routines, recognize their practical and symbolic value and, when possible, create a link between their own interventions and these routines.

B. Historical Group Debriefing

A method of group debriefing following combat exposure was developed, during World War II, by the chief historian for the US army, Brigadier General Samuel Lyman Atwood Marshall and was applied to a large number of combat units during

that war and in Korea and Vietnam. In its essence Marshall's method consists of a cognitive review of the event, step by step, without any attempt to address address its psychological impact on individuals

Although primarily aimed at gathering historical data, Marshall's method has resulted, according to its inventor, in profound psychological changes among the soldiers debriefed. The following report on Marshall's work is based on the author's study of his field notes at the US Army Institute of Military History in Carlisle, PA..

Marshall's focal point was the study of the performance of small units in ground combat. He was especially interested in those psychological factors that enable men to act, and for groups to maintain their integrity (Marshall, 1947). Marshall was also aware of the individual's inability to identify and make sense of the overall pattern of a combat event in which he participated. Indeed, he grasped one of the major psychological attributes of traumatic events: their chaotic unfolding in the eyes of individuals involved. Consequently, Marshall believed that the historical truth of combat could only be accessed through reconstruction of group narratives. His method of historical group debriefing was designed to restore such comprehensive description.

Marshall's debriefing sessions took place on the battle field as soon as possible after the action.

All the survivors of the battle were present, with the exception of the medically evacuated.

Prior to the session, Marshall learned about the battle outline and the specific role played by the unit to be debriefed. Getting acquainted with technical information (e.g., ground, weather, manpower, weapons, food, ammunition, etc...) was considered as sine-qua-non for analyzing the material brought by the group during the session.

The sessions opened by informing the group of the procedure and its goals The instructions defined the group's task as *"describing the combat with all the possible details"* and emphasized the significance, for the Army, of learning from the group's experience. Witness were encouraged to speak and to share their experiences with the whole group.

For the duration of the session, military ranks were set aside. Testimonies were, therefore, weighed according to their pertinence in understanding the course of the operation and not to the rank of the witness. *"Here you are all equal witness: For the time being we all stand on the same ground. If you hear any man present, whatever his rank, say something which you think is incorrect....it is your duty to stand up and speak your piece"* (Marshall, 1944 p. 206).

After a short period of modeling by the military historian, company commanders were often invited to take the lead and conduct the interview. The professional leader, however, was always there to remind the commander not to use the session for teaching lessons and to refrain from expressing opinions on a soldier's conduct during the fight.

The reconstruction of the battle, Marshall insisted, had to follow a "strict chronological path" and uncover the events in sequential order. This structure helped to avoid evasions and to focus the discussion on factual reality rather than on interpretation. Accordingly, all the available information on each stage of the battle

was exhaustively collected from all the witness.

Besides factual reality the reconstruction of the battle history included the soldiers' thoughts, assumptions and feelings during the fight and the decisions and actions that followed. The "group's spirit" was also part of the factual reality. Fatigue, malnutrition and anticipatory intuitions that preceded the engagement were recorded and studied as potential causes of behavior during the action.

Tolerance of ambiguous information was the rule and premature closure was systematically avoided. Contradictory statements lead to encouraging further clarification and looking for more details.

The attitude of the interviewer should be of *"warm interest and respectful attention"*. *"He cannot obtain the interest of the company and its complete participation unless he conducts himself as a student rather than as a teacher"*

Marshall's debriefing sessions are the longest described in the literature and have not been replicated by others: Ideally, the sessions should have been limited only *"by the time it takes to achieve the desired result."* Debriefing was, therefore, continued until the whole picture was obtained. Marshall approximated that seven hours were necessary to debrief one fighting day. Allegedly some debriefing sessions took three working days.

Marshall recognized the existence of group resistance and had to deal with it. He described, in fact, a group process which opens with an atmosphere of caution and closure and progresses into openness and enthusiastic participation. With some companies a congenial atmosphere could be established *"within ten minutes of the start of an interview"* while in other cases, the interviewing officer had to work patiently with the company for a day or longer before the "dam breaks". Marshall also postulated a relationship between difficulties in debriefing and the quality of leadership: a company with poor leaders was harder to engage in debriefing.

As far as we know, the emotional reactions of the soldiers to combat on the one hand, and those encountered during the sessions on the other hand were neither elaborated nor reflected upon. In a subtle way, however, this mode of debriefing seems to have turned individuals who had just endured a situation over which they had little control into participants, active in shaping the meaning of their recent experience. Similarly, some degree of emotional ventilation may have been facilitated by the sessions.

Both Marshall's cognitive rehearsal method and the 'Task-Oriented debriefing' described earlier are examples of debriefing in which the individual's well being is not the primary goal. It transpires, however, that by the fact of introducing an institutional ritual or of allowing cognitive rehearsal and sharing by the group, even such 'non-psychological' group sessions may have a profound effect on the individuals' appraisal and distress.

The following, more recent methods have been put together be mental health professionals and are explicitly oriented at providing immediate and long term help.

C. Psychological Group Debriefing

Among the numerous clinicians who have used post-event debriefing for the purposes of therapy or prevention, the works of Beverly Raphael (1986) and Jeffry Mitchell (1982,1983) are most widely cited. The following description of these

methods will provide all the necessary elements for our discussion of the generics of psychological debriefing.

Following a successful debriefing session of a volunteer rescue team after the Granville rail disaster (Raphael et al. 1984), B. Raphael (1986) formulated guidelines for debriefing teams of helpers involved in disaster rescue.

[[[The description of the original intervention is compelling: "Sitting around in a group and drinking beer they discussed with the consultant (and in a half joking fashion) a wide range of topics: the frustration of their role and sense of helplessness; the fear several had about dying themselves in the narrow space; the terror and revulsion at all these deaths... the post traumatic stress reactions of intrusive images, nightmares and fears, the difficulties sharing the experience with their families, and the fact that they could not unload their feelings because immediately after they have finished their work at the rail disaster their were called out to several road accidents rescue and were still in an alert, aroused state. As the evening progressed the consultant helped these workers to accept the naturalness of their fears and regain their sense of mastery through discussion, release of feelings and externalization of their experience." (Raphael 1986, p. 255.)]]]]

Raphael conceives the goal of debriefing as primarily preventive: "to help the workers deal with the inevitable stresses so that problems do not arise subsequently". The setting recommended is that of formal group sessions, and the healing theory is straightforward: "The experience is given a cognitive structure and the emotional release of reviewing it helps the worker to a sense of achievement and distancing" (p.286). As with other authors, the follow up data is anecdotal - although positive, and the immediate relief unmeasured.

Similar to B. Raphael's method, the Critical Incident Stress Debriefing method (CISD), was developed by J Mitchell (1981, 1982, 1983) and has been applied to several groups of rescue workers (Melton, 1985; Mitchel, 1986). The CISD's protocol comprises a series of consecutive steps through which various aspects of the traumatic exposure are explored and worked through by the group:

Phases of the Critical Incident Stress Debriefing (CISD)

Introductory phase

Facts phase

Thought phase

Reaction phase

Symptoms phase

Teaching phase

Re-entry phase

Adapted from Mitchell, 1983

Ventilation, mobilization of social support as well as education and identification of symptomatic individuals are used. The focus is on individuals and their reactions and not on the group as such. The evidence concerning the outcome of the intervention is anecdotal, however enthusiastically positive. Follow up data is lacking. However the explicit structure of Mitchell's protocol has allowed a number of health professionals (e.g., Melton, 1985) to conduct similar debriefing sessions.

Other reports of psychological debriefing generally follow the same lines (Dunning & Silva, 1980, Wagner 1979, Bergman & Queen, 1986, Griffin 1987; Jones 1985) - particularly with their focus on individuals and their needs rather than on enhancing group cohesiveness and resilience.

Generalization and Recommendations

As of today the principle problem with debriefing methods is the absolute lack of empirical research. The challenge for the future lays therefore in our capacity to provide convincing evidence concerning the curative and the preventive effects of this method. Such research is obviously extremely hard to conduct. Let me, as a preliminary stage towards such study underline what I think may be the generic aspects of this technique and the variables that one may operationalize and study.

The framework that I would like to suggest is based on the the study of the following four variables: 1. The nature of the trauma (independent variable); 2. The goals of the intervention (dependent variables); 3. The techniques used (intervention variable); and 4. The inferred mechanism of action of the intervention.

1. The nature of the trauma

Included in this category are those elements that precede the intervention and determine the conditions under which it takes place. They must be taken into consideration in planning, designing, and in analyzing the outcome of debriefing. They comprise attributes of the traumatic event (agent variables) of the group exposed and debriefed (host variables) and of the mode of exposure (interaction variables).

Debriefing: Nature of the Trauma (I)

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1. The traumatic event (Agent Variables)

> Type: (e.g., Natural disaster/Man made disaster/Combat/Terror).

> Configuration: (e.g., Duration/ Degree of disruption of social

> structures/ Unique or repetitive event/ Presence of secondary

> stressors/Recovery environment)

2. The group (Host Variables)

> Organization and homogeneity (e.g., Ad hoc group/ Organized group)

Group culture (e.g., Hierarchy/ Rituals/ Style of leadership)

Preparation and training

Expectation of future exposures.

? Group-event interaction

Sources of stress: Life threat/ Loss/ Separation/ Dehumanization-

degradation/ Exposure to the grotesque/ Torture/ Sexual

exploitation etc....

Role of the group: Passive victims/ Active participants / Secondary

victims/ Rescue workers..

Degrees of control over the exposure (e.g.,volunteers/ non-

volunteers)

II. Goals of the treatment

These are behaviors, emotions, cognitive attitudes, and group factors that the intervention intends to change. They can be divided into individual and group effects, and into short-term and long-term effects.

Debriefing: Goals of the Treatment (II)

1. Group effects: Improved communication/ Enhancement of group cohesion/

Readiness for future exposure/ Symbolization and attribution of meaning/

Grief processes.

2. Individual effects: Decrease in overwhelming emotions/ Reduction of

symptomatology/ Decrease in cognitive disarray / Enhanced sense of self

efficacy/ Facilitation of emotional disclosure/ Facilitation of help-seeking

behavior/ Initiation of grief process/ Legitimization of feelings and actions.

III. Techniques used

These variables should clearly reflect the ways in which the intervention is being carried out, and the technical processes allowed. Their description should capture and define those elements of the intervention that are expected to affect its outcome.

Debriefing: Technical Variables (III)

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1. Timing: Immediate/ Delayed

2. Setting: Site/ Institutional framework/ Rules that govern participation

      (voluntary/mandatory)

3. Technique: Length of time /Style of leadership/ Use of specific techniques

      (Ventilaion, suggestion, education etc..)

4. Content: Review of factual reality/ Exploration of emotions /Elaborations of

      appraisal and attribution/ Detection of individuals at risk

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IV. Mechanisms of action

Whenever possible, practitioners of debriefing should be explicit about the elements of the trauma that they wish to temper and the corrective aspects of the intervention. Among these are:

1. Emotional Dyscontrol: Disabling affects such as terror, panic, sadness, guilt, sense of failed enactment, numbing and freezing of affect.

2. Cognitive dysfunctions related to the state of increased arousal (e.g., narrowing of the cognitive field, inability to concentrate or shift attention etc..).

3. Shattered cognitive schemata of control, security, invulnerability etc..

4. Loss of the capacity to enjoy rewarding interpersonal contacts

5. "Traumatic Membrane" effect: Perceptual and cognitive dissonance resulting from the subject's inability to disengage from the disaster experience and reestablish a continuity of meaning and experiencing with 'normal' life (Shatan, 1974, Lindy, 1985).

5. Traumatic conditioning effect: Conditioned emotional responses to a variety of cues which may trigger intense negative experiences. Persistence of iconic memories.

6. Impacted grief: The inability to engage in a *reparative process of mourning.

7. Traumatic group effects such as scapegoating, projection, nihilistic and anti-social attitudes.

Conclusion

Despite of a growing number of supporters, of numerous anecdotal reports, and of a strong theoretical rationale, the practice of debriefing must receive further empirical support in order to be accepted by both professional and decision makers involved in stress management. This can only be achieved through empirical research that involves the measure of immediate and long-term effects of this technique. As with other research efforts in the area of trauma this is far from a simple task. Debriefing is, by definition, practiced in situations that are hardly appropriate for research purposes, and one should, therefore, expect numerous difficulties with regard to measuring its effect and using appropriate control groups. At the current state of knowledge, indeed, naturalistic, uncontrolled studies, demonstrating an immediate effect on individuals' symptomatology, distress and well being, may constitute an considerable step forward.